How to optimize your chess preparation

The ZUGZWANG Method

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“Great accomplishments are composed of minute details. Those who succeed in attaining the Whole have attended carefully to each tiny part. Those who fail have ignored or taken too lightly what they deemed to be insignificant. The enlightened person overlooks nothing.”

Han Shan

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Introduction: Who is this book for?

First, allow me to tell you a little about me. I'd like to introduce myself briefly.

I started playing chess at the age of seven or eight. I soon had the opportunity to connect with others and play in a modest club at a regional level. Thirty years have passed since then, and I had the opportunity to train with the Grandmasters Herminio Herráiz and Irisberto Herrera, playing in the Madrid Premier Division, the highest in Spain, and having some decent performances in international tournaments.

Due to certain personal circumstances, I could not continue progressing. Although I reached a rating of 2100 ELO, it is a modest mark of which I am very proud. But more importantly for me, in this time I've shared with many fellow chess players and students, are the many questions asked both as a student and as a teacher that have helped me to go in my own direction, in terms of both the game and preparation.

Chess is exciting and one of the reasons it so attracts us is its enormous difficulty. I have a great respect for the complexity of this sport, art, science and game. For this reason, approximately six years ago, in a process of personal searching, I was incredibly lucky to meet who, for me, is, above all, a person of great human qualities: my friend and grandmaster, Herminio Herráiz. I shared with him many hours of preparation, including our work together in the construction of the pedagogical basis of other projects. These experiences formed the fertile ground where the seed of my curiosity was planted: a player who had read countless books, but was not finding this by itself an effective way.

After this time of guidance and personal experimentation, together with my interest in the human mind and my somewhat heterogeneous background, I decided to develop this book in order to give any player a basis on which to develop their preparation. This is much more than a first aid manual. It is a tool by which you learn to value yourself in the infinite universe of books, software, texts, examples, etc. that exist. In this manual, you will not find fish. What I intend to do is teach you to fish.

In reality, all of these pages are geared to any player, because it is also a tribute to the knowledge of chess in general. But it's true that it's focused expressly on players rated between 1500 and 2100 ELO, who are ready to take their skills to that next level. Players who already know how to play perfectly, and know how to avoid leaving pieces vulnerable.

However, it is likely that throughout the book, lessons will bring you to a halt as they require from you something considerably above your level, so, regardless of your level, even rated above 2200 ELO, you will find in this manual information that you didn't know and, through it, you can acquire a vision and philosophy of the game that will be useful.

What exactly is The Zugzwang Method?

The Zugzwang Method is a method for progression in chess that is constructed from the interpretation of the nature of the game. In this method, the concept of error, in general, and work on the errors themselves and others is one of the fundamental keys.

Now, in this book I do not write only of the error as an oversight, blundering a piece or not seeing a checkmate combination; i.e. a purely technical question. Error is also a utilizing a paradigm of obsolete thinking. It is playing with limited beliefs. It is not knowing how to properly manage time or our emotions. It is not having the minimum principles and values to be able to progress. Behind each one of our errors, whatever they might be, there is a deficiency. Before planting that first seed on a plot of ground, we must fertilize that ground, so that a continuous system of preparation and cerebral gymnastics can elevate our level of play. For these reasons, the first phase of this book is to help you understand, very deeply, the nature of the game of chess. Next, you can begin to set aside those habits that are inhibiting your progression, and, finally, throughout the remainder of the book, you will implant a system of adequate and effective training.

The Zugzwang Method will help you to understand your game and faithfully show you who you are and where you are, and then, after that, it will give you a glimpse of the seemingly distant future of where you want to go.

What The Zugzwang Method is not

The Zugzwang Method is not a magic potion, nor does it replace all of the chess books that exist. I would also dare to say, with absolute humility, that in many respects it will not surpass other chess manuals, since the goal is not to make an encyclopedia of a million volumes. In any facet of life, I believe in shortcuts not in snake oil salesmen. You will not increase by 200 ELO in your next tournament just by reading this book; nor will you become someone special, or overnight start to make brilliant moves.

But I am completely convinced that, with this work of more than six months of writing, dedication, research, purification and love for chess, you will receive a very solid basis to start working, and you can do so in an orderly fashion and with a positive and effective approach.

Also, you will receive a schematic, clear principles and tools so that “you learn to fish” by yourself. If you believe in the effectiveness of strength, perseverance and hard work rather than seeking instant remedies, rest assured that this manual will meet all your expectations.

The five steps of The Zugzwang Method

A. To understand the nature of the game of chess

The Zugzwang Method is based on a very simple premise: it is not possible to play better and win more games while playing poorly or making mistakes. To understand this premise, it is important to know the nature of the game of chess, something that often we overlook or, even, fail to stop and consider.

We spend too much time engaged in play or focused on those aspects of the preparation that we like most, and this aspect has been forgotten; sometimes it could be said that it never existed, and therefore can't be forgotten.

In the majority of sports, a vastly inferior team, or an inferior player, may end up winning against a superior one. We all know soccer matches, for example, where one of the best teams in the world was beat by a low-budget regional team. It is true that this is not too common, but it can happen. Conversely, it is literally impossible to witness Magnus Carlsen or Veselin Topalov losing to an amateur player. Why is this?

To this peculiarity, we must add another: in chess the distance between the player and the most modest amateur is much greater than that which exists in any other sport. It is really hard to say why this is so. Most likely, the explanation is linked to complexity, but it is a reality.

When a good club player, say 2100 to 2200 ELO, analyzes a game with a "modest" international master he/she perceives that between he/she and the master there is an abyss, but another abyss exists between that international master and a "modest" grandmaster, or between an 1800 player and a good club player, and between a rookie and an 1800 player. We are, somehow, surrounded by pedagogical "abysses". And also moving from one level of "abyss" to another, as if scaling a pyramid, is becoming increasingly difficult. That is to say, that increasing your rating from 1400 to 1800 ELO is relatively simple, but from 1800 to 2200 is not, and from 2200 to 2600 is virtually impossible.

All this can be explained by the nature of the game of chess. Chess is a zero-sum game; i.e., what you do wrong is what your opponent (without moving) has already done well if you understand your mistake. You do not need to do very much. Technically, if you make a tactical or positional error, you will generate a resultant position that will be inherently better for your rival, but not only at that point in time, but throughout the game. This is a substantial difference compared to other sports. If you are a tennis player, for example, and blunder once, the scoreboard will reflect a slight gain by your opponent, but that mistake will not have such a destructive effect on the final result as it will in chess. Hence, too, the defeats are so devastating.

What does all of the above mean? Something very interesting: your mistakes, to a certain level, are more important than your successes. You can have that incredible tactical ability or positional vision of Mikhail Botvinnik, but if you make mistakes of some kind, all that ability will be weighed down incredibly. Imagine yourself as if you were a chain composed of various links, the strength of your endgame will be determined by the weakest, not the strongest link. It would equate to the greatest expert in the world in the king vs. pawn endgame, leaving pieces "hanging" when calculating lines. The Zugzwang Method aims to directly attack the causes and not the symptoms. And being aware of this is a very important step; hence the relevance of this chapter.

You must work over and over again on your mistakes, understand very well what type of game you play and add to this, as I explain in the chapter “How to manage failure”, the cultivation of the habit, in one way or another from humility. Without humility, objectivity is a vice and our criterion is no longer useful.

1. The chess learning curve

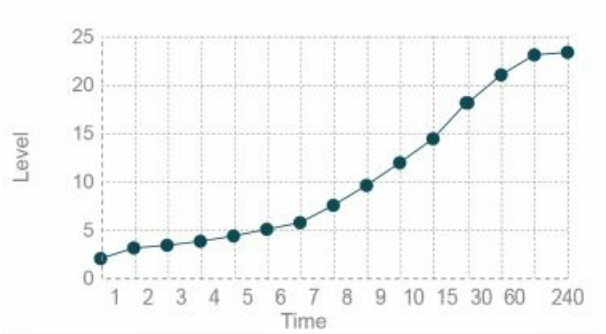
A learning curve describes the degree of success during learning over time. It is a diagram in which the horizontal axis represents the elapsed time and the vertical axis the number of successes achieved in that time. Each discipline has its own learning curve. There are disciplines that, in their simplicity, make it easy to become an expert, for example, the game of checkers (and forgive me checkers players). And others, in which becoming an expert takes much longer, even a lifetime, such as chess. In addition, each learning curve is the product of the student and his/her time. We do not all learn in the same way; nor do we learn at an equal pace.

However, through years of practice and teaching, I have observed that learning chess, once you've surpassed the initial phase of learning how to move the pieces and not commit blunders, and you have understood and implemented the essential elements (I mean players rated between 1600 and 1900 ELO), the way the game evolves in a correct manner is very similar; i.e., we are gaining small advantages. The acquisition of small and imperceptible skills is much the same, until at a certain point these micro-advantages are compounded until they manifest themselves on the board and we can perceive them. In that moment, we have a "cushion" comfortable enough to allow us to play our game with greater certainty. Explained in another way: when you start a training plan, you just make note of improvements until, one day, you begin to perceive that you are becoming another type of player.

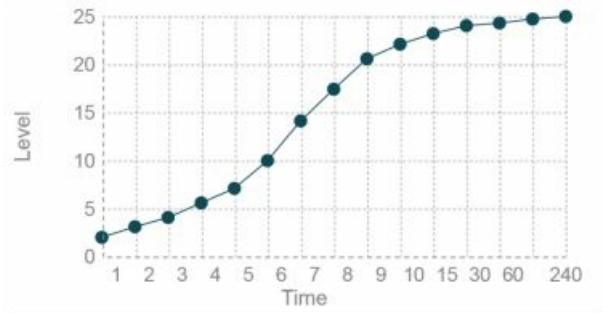
Let's take this to the board.

Imagine that you just took a pawn without any compensation for the opponent, the game has turned in our favor and we can play in a different manner than when we were on an equitable playing field. When "we take a pawn," pedagogically speaking, something similar happens. But

until then, we have the impression of being evenly matched, not going forward or back, not noticing significant changes in our level or in our learning. See the subsequent graphics.



Chess learning curve for intermediate players



Chess learning curve for beginners

The novice player who barely knows the rules, exceptions, soon begins to progress and takes a while to hit that sticking point. This sticking point is often reached at around 1500-1600 ELO. Meanwhile, the intermediate player who has already hit a sticking point, can be anywhere between 1500 and 2100 ELO. Time is being wasted reinforcing bad habits, useless knowledge and programming your brain with certain patterns and practices that should be replaced by other tools. This process takes time, and requires not only adding tools, but also transforming what you already have. For this reason, progress occurs in this way, with this rhythm and a certain slowness.

From a neural point of view, today we know that through unique behavioral and learning experiences, our brains also develop into different brains. Until relatively recently, it was thought that our brains changed every time you learned something. But the research suggests that this is not so. It seems that the brain will acquire new knowledge and therefore will update its potential

for plasticity (modeling through the generation of new neural connections), if the new learning means an improvement in our behavior. This, in practice, means that successive “useless” learning that we have been doing will have no real effect on our brain: the engine of our sport.

It is very important to understand all of the above because it is directly linked to our motivation, and where our motivation lies, we will place our attention and our energy, and this will emerge as a result of our successes.

In short, when you decide to start a stage of progress in chess, it will take time until that learning occurs. At the beginning, you will have the feeling of not evolving, but it is very important that you persist, while not noting improvements in your game or that you win more games. **The moment will arrive, with 100% certainty, that your level will be increased and, with it, your results.**

> ***“Nothing in this world can take the place of persistence. Talent will not: Nothing is more common than unsuccessful men with talent. Genius will not; unrewarded genius is almost a proverb. Education will not. The world is full of educated derelicts. Persistence and determination are omnipotent.”*** **(Calvin Coolidge)**

2. Your minimum level of game

I may have good news for you. Although to be honest, it is really not good news; it is simply a piece of news that will help you to not see things worse than they are.

All have a minimum level of play; i.e., a level that, despite being in very bad shape and lacking in practice, "can't get any worse." On the other side is our **best potential level**; i.e., the maximum that we will not overcome regardless of how much we train and practice; all of us have it, including Magnus Carlsen.

Our minimum level of play rises in the same manner as our real level. I call **real level** the ELO you have at this time. If you increase your ELO and, therefore, your real level, you'll also increase your minimum level of play when you are out of shape, or when you win at an older age and your cognitive abilities (concerning the reasoning) have dwindled.

Your real level is your ELO, and not the level you say you play at or what you're capable of doing. It seems important to me that you assume this, at times, painful concept. The excuses that you add to your progress hinder you only more. Assume that your ELO is your level and focus on overcoming it. It is an objective measure that is very well founded and represents fairly reliably your level of play. If your ELO is low, your level is low.

See, for example, the following graph:

It is the official progression of the FIDE rating of one of the most long-lived and legendary players: Viktor Korchnoi. Korchnoi, who quite unfortunately passed away recently, was for a long time the most senior active chess master on the international circuit. He ascended to the World Chess elite matches against figures such as Mikhail Tal, Tigran Petrosian and Boris Spassky, following the path traced by Mikhail Botvinnik. Korchnoi never reached the summit, as his compatriots did. When Spassky beat Petrosian and took the World Championship in 1969, the Russian Chess Federation launched a campaign for the promotion of younger values that marginalized Korchnoi and Vasily Smyslov into the role of old guard (for ceremonial purposes only), and they were not given the chance to play in international chess tournaments, but by 2015 he was still playing at a high level although this had decreased a little.

As noted in the graph, Korchnoi declined from 2657 to 2500 ELO. He suffered a gradual decline of 167 points. The same thing has happened with many other players, such as Anatoly Karpov. But I really want to draw attention to the fact that, despite his advanced age or finding himself in the most adverse of circumstances for a professional player, we will see that regarding Korchnoi or Karpov, I take them as examples to explain this concept of a real level of 2200 ELO or less.

Our level can decrease to a certain extent, because patterns and valid knowledge that we have incorporated into our game are sufficient, by themselves, to compensate for the loss of our skills: mental agility, physical and mental strength, tactical capability, etc. I want to underline this "valid" concept. This also happens when we are out of shape. Only the tactics and resources fully internalized keep us afloat and do not allow our level to decrease indefinitely. For example, in

the case of Karpov it will be virtually impossible, or should I say impossible, that in his worst personal scenario, he would lose against a player rated 2000 ELO. And the explanation is that the knowledge and resources that have most positively influenced his previous results will be the most ingrained, which are also the most difficult to lose.

The usefulness of the previous statements is not evident at first glance. Thanks to this principle, we are able to separate the wheat from the chaff. And as you progress in your preparation, you will perceive that, as happened to Korchnoi or Karpov, if you are on the right track, a series of chess elements (positional interpretation, assessment, planning, tactical patterns...) will begin to be permanently interpreted in another form. And when that happens, it means that we are on the right track.

Truthfully, the most effective resources are those which hold our approximate minimum level steady. This level in our lowest "containment" profile, is a consequence of having incorporated effective resources in the past (more elementary is how much lower our level of play). The above implies even more than that. If we incorporate the knowledge and appropriate skills, our minimum level of game will increase permanently. It is when our minimum level rises permanently that we are able to replace old and antiquated knowledge for new, more efficient insight. This is the key to everything.

This signifies to us a new milestone in our training within the philosophy of The Zugzwang Method: **it is as important to maintain an active chess rhythm and our updated skills as it is to incorporate stable and permanent patterns and guidelines which serve as a basis for other more-complex future processes.**

To complete the explanation above, I will tell you a bit about history and studies which help us to understand how, even in other areas, a skilled mind works.

Between the 1940s and 1970s, an analysis was done on why some radiologists were able to detect anomalies in chest x-rays that were presented briefly for just 200ms (Kundel and Nodine, 1975), and chess experts were able to memorize chess boards that were only presented to them for a few seconds (De Groot 1946, 1965; Chase & Simon, 1973). Examining visual samples that require multiple ocular fixations for encoding, it was concluded that **experts are experts for their ability to focus quickly on pertinent areas**, in a way that radiologists can look quickly at the anomalies (Kundel et al., 2008), and that chess grandmasters can quickly fixate on the key elements of the position (Charness et al) 2001). This is probably also the reason why elite grandmasters only have doubts about 5% of their moves, which means that, in a game of some 40 moves, they may have real difficulties deciding two or three moves. Something unthinkable for the club player.

To provide a theoretical explanation of this perceptual ability, Chase and Simon proposed, in

1973, that, after thousands of hours of practice, the GM, IM, and experts in chess in general, acquire memories for a large number of “pieces”, which consist of groups of chess pieces and these pieces are complemented by more memory structures called big templates or patterns. **Such memory structures provide the performance that we are talking about**, allowing these players to quickly retrieve useful information, such as strategies, combinations and advantageous moves. Therefore, these researchers argued that chess experts used their established configuration memory to limit their search for a move among the possible options, instead of performing a slow and exhaustive search of all possible moves. This theoretical perspective echoes previous arguments by De Groot, **chess experience comes from memory and perception advantages, more than from a greater breadth and depth of search during problem solving**.

In accordance with this hypothesis (that chess experts rely on their memory to find positional patterns), a study in 2001 was conducted by Charness that examined the relevance of eye movements. In this way, they monitored the eye movement of experienced players (average ELO score = 2238) and the intermediate players (average ELO = 1786), while selecting the best move for White in a series of chess problems. Compared to intermediate players, experts dedicated a greater proportion of those views to relevant pieces to determine the best move.

Also, the first 10 seconds of trials were analyzed to show that experts quickly ended a phase of perceptual coding (characterized by shorter views) to then move back to a problem-solving stage (characterized by longer fixations). In stark contrast, intermediates continued with short fixations throughout the period of 10 seconds, which indicated that they needed more time to complete the phase of perceptual coding. Taken together, these studies indicate that **chess experts are more efficient at encoding chess configurations during the resolution of a problem.**

But two years ago, in 2014, we had additional confirmation that this is so. The researchers Heather Sheridan and Eyal M. Reingold of the University of Southampton, United Kingdom, in a new trial of eye movement monitoring, which compared high level players with club level players, concluded that expert performance reflected a complex interrelation of perceptual and cognitive processing (with reference to the reasoning), and that the structures formed in the memory led to an advantage of perceptual coding that chess experts are capable of processing stimuli in terms of patterns of much larger configurations, rather than focusing only on individual characteristics. Accordingly, high level chess players are able to use their memory to find equivalences and guide their search for the best move on the board, rather than exhaustively searching all possible moves.

The previously mentioned studies add to the above study. To avoid misunderstandings, I

would add that experienced players also calculated with greater depth than lower level players, but it seems that this is the first condition that separates one from the other.

Taking into account all of the above is fundamental for the preparation of any chess player in general, but inevitably for players who want to escape forever from their current level.

3. The trend of modern chess. Effective time management

For better or for worse, current chess has taken a direction completely novel if we consider the hundreds of years of history.

At present, the pace of play has accelerated rapidly. Behind us are long postponed games tournaments, month-long competitions and games that literally last a whole day. But not only that, also left behind are the international tournaments for club players of games of five or six hours and eight or nine days. Little by little, FIDE has been recognizing a certain prestige to blitz games and ultra-fast chess, creating these two new "types of ELO" next to the traditional ELO for slow games. They have also been speeding up the pace of slow games, which are increasingly "less slow."

Thus, the tournament player wanting to improve their rating must take into account this new context.

Chess has been, for a long time, a model for studying the complex thought processes. In particular, the consensus has emerged that **experience in chess focuses on two forms**:

The ability to calculate lines (search).

The ability to recognize and remember significant patterns on the board (pattern recognition).

The prevailing view is that players with higher ELO, in contrast to the weaker ones, excel specifically due their ability in fast pattern recognition, as explained in the section "Your minimum level of game."

Naively, one would expect that the “temporary stress”, represented by time trouble, could further amplify these level differences, but this assessment is too simplistic. Let's expand a little more its conception...

A very firmly seated chess culture idea is that good players don't calculate much; they just calculate better. David Bronstein, undoubtedly one of the most creative players, was adept at this point of view:

> *"I have always defended the play under time trouble, and don't believe that lack of time is a bad thing. On the contrary, I have always thought that speed games are a measure of the ability to play chess*" (David Bronstein).

First of all, there is substantial evidence that chess experts do not search "more broadly"; i.e.

valuing more possibilities, but that they search in greater depth than the weaker players. Secondly, when a player is forced to play faster, "performance" becomes less predictable. For example, suppose that we expect an advanced player to commit a fatal error every 200 moves; in time-trouble conditions we cannot ensure that this ratio will be maintained. In fact, it is not surprising that even grandmasters commit more errors and miscalculations under the conditions of having less time than usual to select their moves (Chabris and Hearst, 2003). Therefore, time trouble causes selective improvement of rapid pattern recognition, which favors the best players, but also increases the likelihood of mistakes, which tends to equalize the game. Therefore, the lack of time and the capacity for analysis and play in general, interact in a non-trivial way.

Consideration of time, therefore, introduces many dimensions to evaluate the complexity of the game that we must bear in mind in our preparation. Among these dimensions, we can concentrate on two major issues related to the statistical structure of the game under the limitation of time:

What "dynamic" traits and strategies of the strongest (in comparison with the weakest) players characterize the evolution of the game?

What shape does the trade-off between time and the precision of move execution take?

Given the complexity of the game, blitz games offer a laboratory like no other to understand decision making in a natural environment. Let's see some conclusions that research has provided us, and how we can use them when implementing strategies under time pressure:

- **Decisions are not dictated by a function of state**. What does this mean? The human does not take a position without taking into account everything that has happened previously as a computer does. Previous plans and decisions affect their assessment of the position, whether it is correct or incorrect. **The less time, the greater weight the past has.**
- This is demonstrated in that while mistakes are most typical from weak players, this **way of thinking** is **insufficient** to **classify** a (blitz games) player based on the number of **mistakes**.
- If a **position is difficult** (and therefore requires time thinking), the choice of the next move is also likely to be difficult and therefore long thought-out moves are expected.
- After a slow move in a **difficult position** (for example, when establishing a plan or strategy), it is likely that it will be followed by fast moves (the practical implementation of the plan).
- One of the most common causes of mistakes in general and during time trouble in particular is confusing pieces of the board that existed previously with the current board and the lines yet to be settled.

RECOMMENDATIONS AND STRATEGIES FOR BETTER TIME-TROUBLE PLAY

a) **If your opponent is stronger than you**, seek to generate complications and difficult positions. Otherwise, with their greater ability to naturally find the best patterns on the board, and their lesser predisposition toward making mistakes in "normal" positions, you will be placed in an inferior position.

b) **If your opponent is weaker than you**, make moves that do not compromise your position, and only enter into difficulties if you are absolutely sure that they are beneficial. For example, follow the strategy of letting your opponent make the mistakes and don't try to make perfect moves.

c) Establish a risk policy according to an estimate of the capabilities of your opponent. If during the course of the game, you estimate that your opponent is not as strong as you, despite reaching the endgame in a position of relative balance, you may be more willing to take controlled risks that overcome him/her.

d) When the **remaining time** is **very short**, it is most effective to make a decision, any decision that requires the opponent to ponder several alternative responses. Therefore, in time-critical situations, set your priority on the quantity of moves, rather than quality, since you cannot make many high quality moves.

Although it is easy to say, you should know that entering into time trouble against a player better than you is practically synonymous with defeat. **Avoid entering time trouble with a player rated 200 ELO or more greater than you.**

Now, the chess player not only lives for time trouble. I also said that slow chess has undergone an acceleration and, therefore, this conditions us. Now, thinking over a long period of time about two or more moves (for example, more than 15 minutes for each of them) leads, in practice, and in the majority of games, to playing close to landing in time trouble, of our own making, that we determined the outcome of the game by creating a context that favors the error. Therefore, it is recommended that:

- Do not miss out on **opening preparation**, although preparation of the opening "should not be the core" of your preparation. Occasionally, we spend much of our time trying to gain advantage in the opening or by ignorance of lines that we should know. This can be learned from home.
- Display a **practical chess game**. Practical chess is on the opposite side of perfectionist chess, that is one that causes perpetual dissatisfaction and the player is not content to play something good enough; they want to play, always and in all circumstances, the perfect, ideal option. Practical chess is solid, active, creative and only assumes risks when you have the certainty of success.

♟ Display a **practical chess game**. It tends to work better playing lines and known structures, even if they are a little inferior, rather than to embark on theoretical adventures or play structures in which one is going to have to improvise.

♟ **Learn how to manage the clock**. The clock is not there so you can hit your head with your palm when time trouble arrives. Before any game, follow this small trick: divide the time among the number of moves for the control. If the game is so much time for so many moves, you can divide the time by 42, which is the number of moves that games have initially in 2014 (curiously this figure has increased since 1970 when it was 37). The resulting figure should always be in your head and you look at the clock whenever you make a move to know if you are above or below the time average, aiming to modulate every one of your responses depending on how the game is developing. The idea is that, allow me the expression, you are not "toast", having 10 minutes to play when your opponent is still at 40 minutes to spare.

Another little trick is that you do not spend more than 15 minutes on the opening.

4. It is much harder to defend than attack: active play

It seems a no-brainer, but not many players have stopped to consider this chess truth. In chess, it is much harder to defend than attack. This is part of the nature of the game (remember that we are analyzing and explaining this aspect). It is much easier to think in terms of "what do I want to do" than in terms of "what does my opponent want to do", and in fact, to compensate for this lack, we all carry it with us to a greater or lesser extent, having great impact on our level of play.

To win a game of chess, you not only need to know more chess, and prove it and play better; it's also necessary to better compete. The concepts of playing and competing are very intertwined, but they are not necessarily the same. One can play well without competing well. One may collapse under pressure, may not have clarity about the weight of a game in the entirety of a tournament, or may not consider the psychological weaknesses of the opponent... Similarly, there are good competitors who do not play well, but are able to raise their potential and get better results than if they remain at a static level of play, but they do not compete effectively.

From my point of view, one of the key factors to compete well is to keep in mind this principle: **it is much harder to defend than attack**. It is a principle that overshadows everything. Any chess position has a given difficulty for each of the opponents, with relative independence of the valuation of the same. A position can be technically balanced but can, at the same time, be much more difficult to play for one of the players than for the other, and this will result in competitive advantages for those who have it easier. Usually, this difficulty will be closely tied to the activity or inactivity of the pieces. **In chess, passivity generates weakness**.

And for this reason, it is highly recommended that you always play actively. But, wait a minute!... What is playing in an active way? I will share with you some keys:

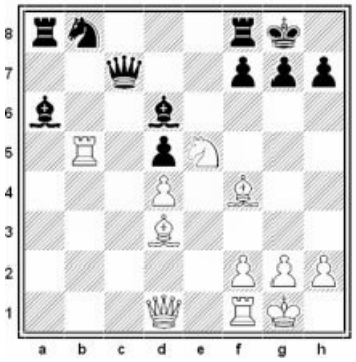
- We play actively when we fight for the initiative, constantly.
- When constructing positions and dynamic structures, namely:
  - Our pieces are well coordinated.
  - The squares, files, ranks, or critical diagonals are controlled.
  - Our pieces are in active attacking positions.
  - It is not as important as the above, but I would add that there should be a reinforcement of a dynamic position we find with dynamic pawn structures (in general, those that are not blocked, although also a closed center can be dynamic on the sides). It is easier to find dynamic positions in the middle game than in the endgame, but they are not solely dependent on that stage.
- Playing in an active manner does not mean attacking under all circumstances. We can actively play without attacking. There are players who always and in any kind of position try combining and attacking an opening in the defense of the rival king. It may sometimes be necessary, but we need to thoroughly study the position to find out what the moment requires. Conclusion: do not attack on “auto-pilot.”

Let's take a look at two examples very representative of what I explain in this point. The first example is easier to understand than the second. Observe the following position. It's a game of Anand against Karpov, played at Las Palmas in 1996:

Anand, Viswanathan (2735) - Karpov, Anatoly (2775) [D21]

Las Palmas (7), 12-17-1996

White to move. Take a few minutes to analyze and familiarize yourself with it.



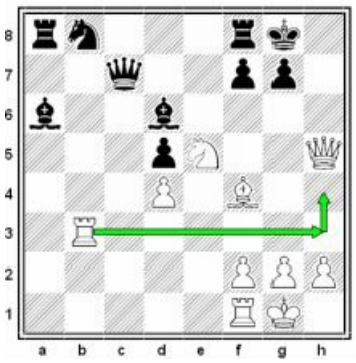
Want to read what Anand said about this position after the end of the game? It is very instructive: "Here, I spent a few seconds analyzing 21.Rxd5 (was the move that was expected in

the press room) that leaves White with a pawn advantage, but I didn't want to bother myself. I saw Bh7+ and decided not to waste more time on Rxd5. Then I spent some time analyzing Bh7+, and didn't see an optimal defense for Black. Then I realized that I was too excited to analyze and decided to put an end to it once and for all. Karpov barely had time and I was sure that he was not going to find a defense."

Anand's reasoning involves a highly competitive component. After analyzing the move Bxh7, he considered that the uncertainty can create enough problems in the context of the game to finish it. Karpov is a great player, but does not count on too much time, and the move Bxh7 is opposite to the expected Rxd5. This will have a devastating impact from the psychological point of view on Black, as we will see later. The move Bxh7 quickly led Karpov to a position much harder to play, but not lost, far from it. In this decision of Anand, we see noticeably one of the most important points underlying the nature of chess, and that is **it is much harder to defend than attack** and, therefore, technically equal positions, that a computer could defend, may not be, for a human, equally simple by the fact that the one who defends will have greater difficulty.

The game continued like this: **21. Bxh7+! Kxh7** [21...Kh8 automatically loses 22.Qh5 g6 23.Bxg6++-] **22.Qh5+ Kg8 23.Rb3** [and again we find ourselves in a very interesting key position. White moves the rook to the third rank with the idea of supporting the queen from h3. The position is very uncomfortable for Black, as a result of the agile and active White game. But really, it still has a defense with possibilities of reaching a certain balance, as we will see later. Why did Black not move correctly? We can find many explanations:

- The **psychological factor** of the move Bxh7. As we know, we do not analyze a position absolutely cold, but that the "past" holds an important weight. In the "past" Anand could move Rxd5, but preferred this totally surprising line...
- Karpov did not have much **time**.
- The **position of Black is much more difficult to play** than White's. He must provide for all the threats and "think with the mind of Anand", which is more difficult and creates greater stress in the first player.



23...Bxe5? [This move lost. The ugly move 23...f6 (ugly because it opens a hole in g6) is the only and best move. The only move. The desire to get rid of the annoying knight on e5 is very understandable, but Black loses the opportunity to give greater resistance. Again, the consequences of playing in a technically defensible position, but more difficult to play].

[23...f6!

(a) 24. Ng6 Bxf4 25.Re1 (25.Qxd5+ Qf7 26.Ne7+ Kh8 27.Rh3+ Bh6 28.Qxa8 Bxf1-+; 25.Rc3 Qd6 26.Re1 Bd2+ 27.Ne7+ Qxe7 28.Rxe7 Bc4 29.g3 Nc6 with Black advantage) 25...Nc6 (25...Bc4 26.Nxf8 Nc6 27.Qh7+ Kxf8 28.Qh8+ Kf7 29.Qxf8 slight White advantage) 26.Nxf4 Qd6;

(b) 24.Rh3 fxe5 25.dxe5 Qc4! 26.Qh7+ Kf7 27.e6+ Kf6 (27…Kxe6 28.Re1+!+–; 27…Ke8 28.Qg6+ Kd8 29.Bg5+ Kc8 30.Rc1± Qxc1+

b1) 28.Bg5+ 28…Kxe6 29.Re1+ Kd7 30.Qxg7+ Kc6 31.Rc3 Nd7 32.Rxc4+ Bxc4 White has a lot of pawns on the kingside, but the black king is safe and, now, the second player can activate his pieces.

b2) 28.Rh6+? gxh6 29.Qxh6+ Kf5 (29…Ke7 30.Bg5++–) 30.g4+ Ke4 31.Re1+ Qe2! (31…Kd3 32.Qg6+ Kd4 33.Bxd6) 32.Rxe2+ Bxe2 33.Bxd6 Ra1+ 34.Kg2 Bf1+! 35.Kg3 Rf3+ 36.Kh4 Rh3+–+)

24.Rh3 [Checkmate is threatened] **24…f6 25.dxe5+– Qe7 26.Qh7+ Kf7 27.Rg3 Ke8** [27…Rg8 28.Qg6+ Kf8 29.exf6 and Black is lost] **28.Rxg7 Qe6 29.exf6 Nc6** [and White is winning in all lines] **30.Ra1 Kd8 31.h4 Bb7 32.Rc1 Ba6 33.Ra1 Bb7 34.Rd1 Ba6 35.Qb1! Rxf6 36.Bg5 1-0**

Karpov finally lost. He was engulfed by the context of his position, by having to play a chess game harder than his rival and, despite having been able, theoretically, to defend, he could not carry it out in practice.

Let's look at another example.

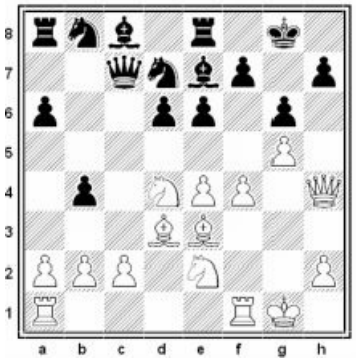
Sutovsky, Emil (2565) - Van Wely, Loek (2605) [B85]

Tilburg Fontys Tilburg (5), 10-16-1996

After 15.Nce2 it is Black’s move. Take a few minutes to analyze it and familiarize yourself with it.

15. Nce2 [the active play of White has resulted in an interesting position. White has already developed all its pieces, and its rooks are connected. In addition, it has an important advantage of space that allows its pieces increased operability. For its part, Black, even if it doesn't have a lost position, nonetheless, faces a more difficult game: playing with less space, not having the

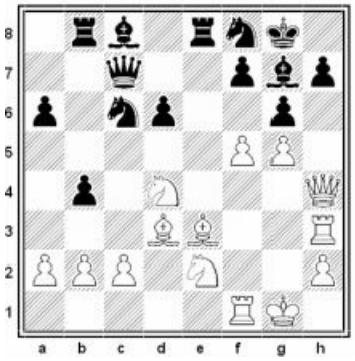
initiative, having deficiencies in development and its king, which is more exposed in the short term. All these factors often lead to mistakes in balanced or nearly balanced positions by the side that is less active, in our example Black].



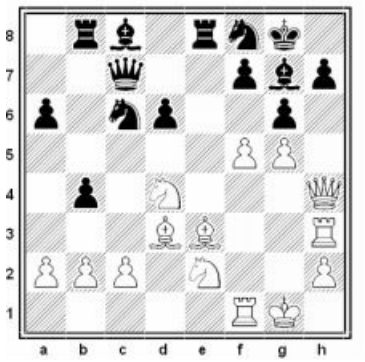
15...Bb7? [Bb7 is a decisive error. For what reason? White threatens the maneuver of the rook: Rf3 and Rh3 (a maneuver similar to what we saw in the game of Karpov against Anand), but Black is not sufficiently showing caution. The correct way to move could be Bf8 to g7 combined with the move Nf8, so the black king is protected.

Again, as we saw in the previous example, **he/she who defends underestimates the possibilities of he/she who attacks**. And he/she is dedicated to making natural moves, desirable from the common sense point of view of the general principles of chess. In this case, the Bb7 move seems to make sense; the bishop is developed to the single open white diagonal, developing one minor piece and facilitating the connection of the rooks. Something similar happened with the Bxe5 move that Karpov made; i.e. it also seemed understandable to eliminate the strong centralized knight to reduce the force attacking White].

[15…Bf8 16.Rf3 Bg7 17.Rh3 Nf8 18.f5 exf5 19.exf5 Nc6 20.Rf1 Rb8 and White has yet to demonstrate how to win this position. Black is well defended].



16.Rf3 [now White's plan is very simple: continue with the Rf3 - Rh3 maneuver and when Black moves h5 to defend checkmate, respond with the Ng3 maneuver, sacrificing the knight on h5 with a lethal attack] **16...h5** [The game is difficult for Black. What do you do in this position?].



[16…Nc6 17.Rh3 Nf8 *(17…h5 18.Ng3 Nxd4 19.Bxd4 e5 20.Nxh5* and White very quickly checkmates Black*)* 18.f5 and then checkmate f5–f6 with Qh6

a) 18.Nxc6 Bxc6 19.Nd4 White advantage;

b) 18.f5 Nxd4 19.Bxd4 gxf5 20.Qh6 e5 21.Ng3 f6 22.Nxf5 Bd8 23.gxf6 exd4 24.Rg3+ Ng6 *(24…Kh8 25.Qg7+ Qxg7 26.fxg7+ Kg8 27.Nh6#)* 25.Rxg6+ hxg6 26.Qxg6+ Kf8 27.Nh6+–; 16…e5 17.Rh3 h5 18.Nf5! Bf8 19.Neg3+–; 16…Nf8 now the bishop on the light square can't reach g7. 17.Rh3 Nbd7 18.f5 threatening f6 is decisive].

17.Ng3 Bf8 18.Nxh5 [a thematic sacrifice when the opponent defends this way] **18…gxh5 19.Qxh5 Bg7 20.f5 exf5** [any other move loses. For example:

[20…Ne5 21.Rh3 *(21.f6 Nxf3+ 22.Nxf3 e5 23.Rf1)* 21…Nbd7 *(21…exf5 22.Qh7+ Kf8 23.Nxf5 f6 24.gxf6+–; 21…Nxd3 22.Qh7+ Kf8 23.f6+–)* 22.Rf1 Nxd3 *(22…exf5 23.Qh7+ Kf8 24.Nxf5+–)* 23.f6+– (23.Qh7+ Kf8 24.f6 *(24.fxe6 N7e5 25.Nf5+–)* 24…Nxf6 25.gxf6 Bxf6 26.Rxf6+–); 20…Nc6 21.fxe6 Nde5 *(21…fxe6 22.Qf7+ Kh7 23.Rh3#)* 22.exf7+ Nxf7 23.g6+–].

21.Nxf5 Nf8 [ironically, Black had looked to set up a defensive structure on the back ranks, but now it is overwhelmed by the White attack. Notice that the Nb8 is still developing and the black rooks are still connected. White is attacking with queen's rook and knight against black knight and bishop. Too much superiority].

[21…Bxe4 22.Nh6+ and the win; 21…Ne5 22.Rh3 Kf8 23.Qh8+ Bxh8 24.Rxh8#; 21…Re5 22.Nh6+ Bxh6 23.Qxf7+ Kh8 24.Rh3+–].

22.Nxg7 Kxg7 23.Bd4+ Re5 24.Raf1 1–0

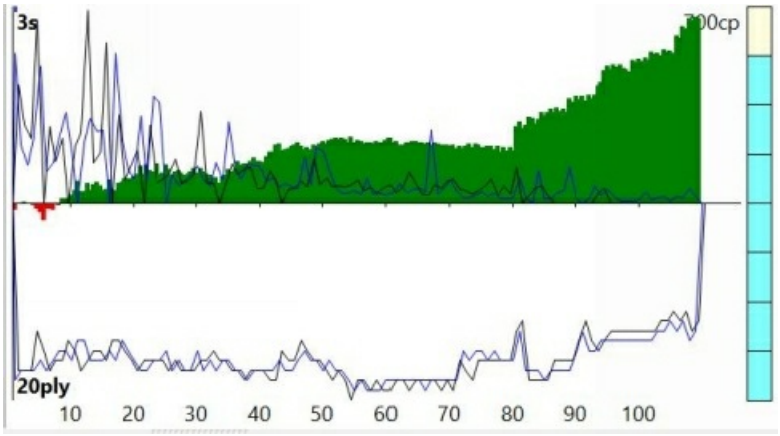
As we have seen in the previous examples, even the elite (Van Wely and Karpov) players are tempted to commit mistakes in the most difficult to play positions, resulting in active play for the

opponent. These mistakes are clearly much greater in club players in similar positions. Forcing your opponent into a position of discomfort is a very powerful tool to get the victory. But I especially want to emphasize the element of difficulty: the objective assessment is not as important as the practical assessment (how difficult it is to play the position).

5. A mistake is much more than a mistake

In general, beginners' games are full of mistakes. Making mistakes and not taking advantage of mistakes, in the short term, will occur the same until one of the two commits an irreparable error or the sum of the errors that is too great and, as a result, that one loses.

The above scenario does not usually occur in intermediate level players, and much less in advanced players and teachers. See the following evaluation profile of a game between two of the best computer engines of the moment. For example, we will see what it is the natural response of chess if we submit it to the experiment of "perfection", bearing in mind that by 2016 these machines could be considered virtually perfect:



What does it mean? The horizontal axis represents the moves which spanned the game (more than 100) and the vertical axis shows us to what side the balance was tilting in evaluating terms. As we see, at first the machines considered Black to be a little better (red color). But starting with move 10, White got some advantage and held that advantage until the end of the game. If you look you close, from move 80, the rhythm to which the advantage grew by White was very fast and, in the last third of the game, it got a lot more advantage than in the previous two-thirds. Why does this matter?

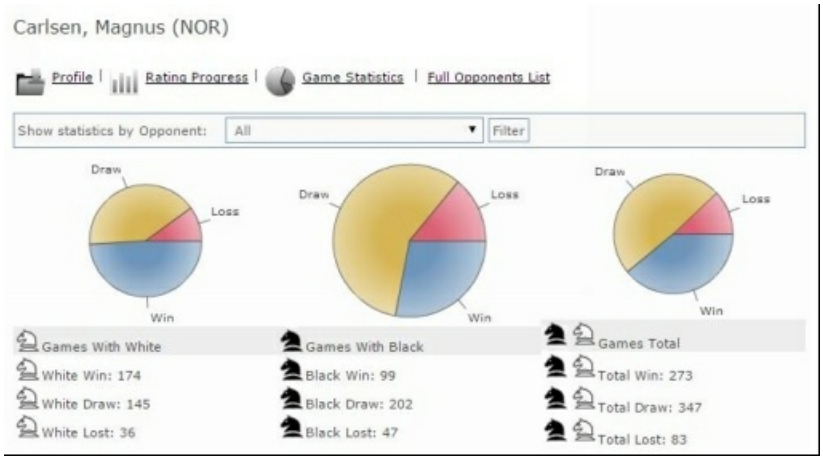
In chess, things don't happen as in other sports. One can lose a soccer match 3-0 and still overcome it. In football (American) or basketball, you can be down at the half, or even going into the 4th quarter, and still come back to win the game. But in chess, if you just lost three pawns, soon you will lose a rook, two rooks and, after that, all your pieces. For example, the

mistakes are punished exponentially by the nature of the game. This happens in all games without serious mistakes. Logically, the greater the level of the opponent, the greater the impact on the result. In a game of novice players, mistakes occur constantly, but this is not chess at its most "pure", played with perfection. Let's take this reasoning to the greatest degree of actual precision: chess engines.

Houdini 4 is one of the most powerful chess engines. According to its developers, Houdini will win 80% of the games against an opponent of equal or lower strength if it gains an advantage of +1, in other words, an advantage of a pawn (let's remember that it is rated 3117 ELO, more than 200 above the best human). And if it gets an advantage of +0.50, it will safely win 50%. These figures are completely stratospheric for any human player, but allow us to highlight the nature of chess and the extent to which mistakes are the basis on which we should focus our learning and efforts. **Our successes are important, but our mistakes even more so**. If you want to improve your level of play, you must not stop making mistakes.

Observe the following graph extracted from the official website for FIDE ratings:

World Champion Magnus Carlsen



Talented player rated 2200 ELO

Player rated 1800 ELO

Look only at the chart on the right. This graph shows the total games for the player. The previous two show us the results segmented by White (first chart) and Black (second chart).

I chose Magnus Carlsen, world champion, who usually plays against the best players on the planet and does not participate in open tournaments. In second place, a talented player rated almost 2200 ELO, who already showed great qualities for chess at a very young age. And in third, an average club player, who hardly trains or prepares, but plays many tournaments and is a big fan. In general, all of them play against players of their level in tournaments, as a result of the Bucholz system, which matches players of equal game strength. Therefore, these data are not biased by the fact that some of them could play against much stronger or much weaker players.

The key to these graphs is the **lost games**. Magnus Carlsen lost only 11.80% of games played. The player rated 2200 ELO lost 26.92%, more than double that of Magnus. And the club player lost 41.19%; i.e. they lose almost half of the games.

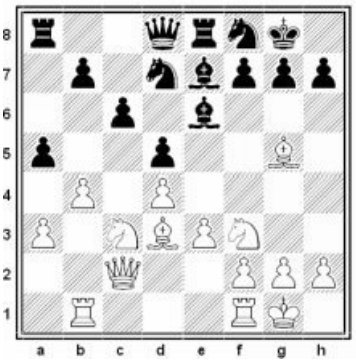
If you analyze the games won, Magnus Carlsen wins 38.83% of games played. The player rated 2200 wins 43.26%, more than Magnus! And the club player wins 44.77%, i.e. the one who has the lowest ELO is the one with the most wins. This surprising result is one of the consequences of the nature of chess, something that constitutes the basis of The Zugzwang Method. **The games that you win are not as important as the games that you don't lose.** Although the previous two things may seem the same, they are not. This effect is also what we perceive in the above graphs, when the chess engines acquire a minimum advantage, it is easy for the situation to quickly get out of hand, which is why it is important that at the very least equality is maintained.

The errors that we discuss are a very different thing. A child who begins to play commits all possible errors, including errors with the rules. A player rated 1800 ELO will continue leaving pieces hanging, although with lower probability than someone who has been playing a year. A player rated 2200 ELO can "leave hanging" a pawn (coincidentally a piece), but a GM losing a pawn is much less likely compared to any of these players. We are going to see a characteristic example of how a very respectable player of 2158 lost a game against a GM in a very simple way.

Mikhalevski, Victor (2531) - Chuvnik, Mordechai (2158) [D36]

ISR-ch Open Ramat Aviv (2), 03-29-1999

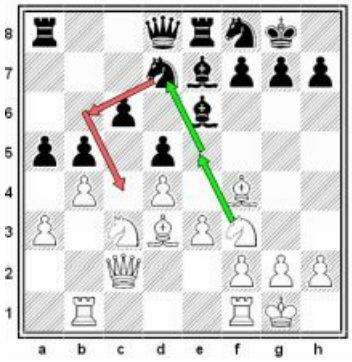
1.d4 d5 2.c4 c6 3.Nf3 Nf6 4.Nc3 e6 5.Bg5 Nbd7 6.cxd5 exd5 7.Qc2 Be7 8.e3 0–0 9.Bd3 Re8 10.0–0 Nf8 11.Rab1 a5 12.a3 Be6 13.b4 N6d7



14.Bf4 [From the strategic point of view, the exchange of dark-squared bishops moves in the favor of the White side by queenside pawn structure. The pawn chain b7-c6-d5 is set to light squares, making the dark-squared bishop more valuable than its partner because it has greater mobility. The swap of bishops could already have been a positionally correct choice, but White makes another additional interpretation: while it is true that a bishop exchange favors White, it is

no less true that Black finds itself with a space deficiency and that its pieces are constrained. This situation makes it a very difficult and uncomfortable game for Black and this is reason enough to not exchange bishops]. [14.Bxe7 Qxe7 15.bxa5!] Rxa5 (15…Qxa3 16.Ra1 *(16.Rxb7*) 16.a4].

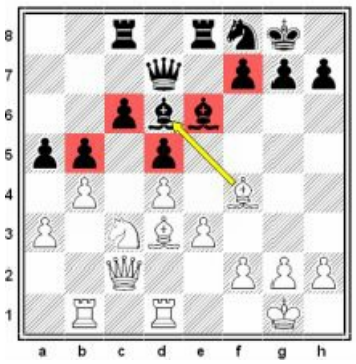
14...b5 [an important moment of the game. The White plan consists of playing e4 and starting a central expansion, but before starting its plan the question arises: what does his opponent want to do? Black is planning to perform the positional threat d7-b6-c4. It follows that it would lead the knight to a very strong advanced point, and the elimination of such a knight on c4 would generate a passed pawn for the second player. White anticipates this threat and eliminates the possibility that this maneuver creates. As we see, White opts to secure its possibilities before taking more active action. It is not as important to have a good plan and to execute it correctly (to win), as it is to integrate our opponent into our plan (not to lose)].



15.Ne5! [This is the way. White proposes exchanging knights and does not move 15.e4. [This measure is sufficient given that the f8 knight is far from the c4 square and it must protect its king, with which it cannot start an offensive on the queenside].

[15.e4 does not provide any advantage 15...dxe4! 16.Bxe4 *(16.Nxe4 Bd5)*16…axb4 17.axb4 Rc8…18.Ne5 with the idea of the game now not enough 18…Nxe5 19.dxe5 *(19.Bxe5 f6)*19… Qd4! 20.Rfd1 Qc4 Black is more active and the weakness of the isolated pawn is noted].

15...Rc8 [preparing axb and then the maneuver that we have discussed:] Nb6-c4] **16.Nxd7. Qxd7** [now it is the time to focus on preparing e4, taking into account that the f8 knight is out of the game and cannot reach the squares d4 or d5] **17.Rfd1 Bd6?!** [a dubious move, resulting from the discomfort of the safe position and a bad positional reading]. Black proposes the trade of its best bishop and leaves on the board the light-squared bishop that is vastly inferior compared to the light square White bishop. 17…axb4 18.axb4 Ra8 and Black can continue playing despite having pieces in strange positions].



18.Bxd6 Qxd6 19.e4 [begin operations] **19...f6?** [A new mistake. After this, Black loses a pawn]. [19...axb4 would have been the right move 20.e5 Qe7 21.axb4 Bg4 Black is worse because of the c6 pawn behind it, the uncoordinated knight on f8 and having only his worst bishop, but he can keep fighting to equalize the game].

20.exd5! Bxd5 [the middle 20...axb4 does not save the pawn 21.Rxb4! Bxd5 22.Nxd5 cxd5 *(22…Qxd5 23.a4! Rb8 24.axb5 cxb5 25.Rxb5!* 23.Qd2±] **21.bxa5! Qxa3?! 22.Nxd5 cxd5 23.Qd2!± Ne6 24.Bxb5 Red8 25.Bf1 Ng5** [looking for counterplay on the e4 square] **26.Qb4!** [note that one of the best ways to achieve a material advantage is not to gain more ground (win), but to exchange the largest possible number of pieces (not losing)].

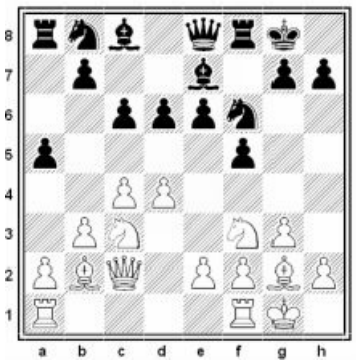
26…Qxb4 27.Rxb4 Ne4 28.a6 [the pawn is very dangerous and the black position is almost desperate] **28…Nd6 29.Ra1 Rd7?! 30.a7+– Rdd8 31.Rab1 Ra8 32.Rb8 Ne8 33.Rxd8 1-0**

To reinforce this concept, I will show you another example in which the Spanish GM San Segundo wins easily against a player rated 2185 ELO by «simply» reading the position and taking advantage of each opportunity that arises after the positional mistakes of Black.

San Segundo Carrillo, Pablo (2505) - Spice, Alan (2185) [A99]

European Championships selections, 1997

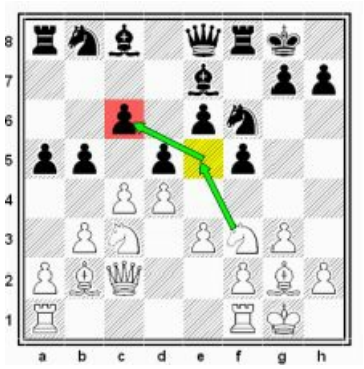
1.c4 f5 2.g3 Nf6 3.Bg2 e6 4.Nc3 Be7 5.Nf3 0–0 6.0–0 d6 7.d4 Qe8 8.b3 a5 9.Bb2 c6 10.Qc2



[So far the game has followed more or less natural paths. White has a slight advantage based on space, but, in return, Black has a dynamic position and striking options in the center, or active maneuvers such as Na6–Nb4 and Qh5 to put pressure on the kingside with the advance g5-g4 (or f4). But, suddenly, Black begins to make important strategic mistakes].

10...d5 [The position is transformed into a "stone-wall" structure where Black concedes the dark squares (such as e5), but instead relies on a strong position that will allow it to develop the pieces without problems].

11.e3 b5?



This move is already beginning to be a significant miscalculation. Black makes several **simultaneous mistakes**:

- Looking for active operations, opening up the position, when its pieces are not prepared for the fight. While the white pieces are already coordinated, the queen on the "c" file, the knight can jump to e5, and the rooks are connected.
- The c6 square is weakened, so the weakness of the e5 square is now more serious (as White can already leverage it for specific attack operations).

[11...b6 seeking to quietly develop pieces on the queenside is more natural.] Once activated these pieces will be already thought about in a more active way (such as the c5 rupture after

placement of a rook on c8)].

12. Ne5± [the strong square “e5" now is important since it is for a particular purpose of attack] [12.cxb5 cxb5 13. Rfc1 is also interesting. Gone is the weakness of the “c6” pawn behind it, but the weakness of the square and above all file “c”, which will allow an invasion of the white pieces 13…Bb7 14. a4! getting the b5 square for the knight].

12...Ra7 [A symptom of the fact that the Black position is “unnatural” and Black cannot follow normal development] [12…bxc4 13.bxc4 Ba6 was the only active justification of Black, although after 14.Rfc1 Nbd7 15.Nxc6 Bxc4 16.a4! White not only seeks activation Nxe7-Ba3 but also places a new knight to attack after 16… Bd6 17.Nb5± the game has been opened up and it is evident that the white pieces are better prepared for active play; 12…Bb7 13.cxb5 cxb5 14.a4! with the strong Nb5 invasion].

13.Rfc1 [the white pieces are placed in a natural way for the opening of the “c” file] **13...Ne4 14.a4** [more opening of lines] **14…bxc4** [14… b4 15.Ne2± the only active black piece, Ne4, will be eliminated with f3. While the white pieces are improving (for example with Nf4) and White is now ready to open the "c" file at the right time Bd6 16.f3 Nf6 17.cxd5 cxd5 18.Nf4, Black is full of weaknesses. Not only the pawns such as e6, but all the dark squares and the "c" file (with good squares of entrance such as c6 and c5 for the knights)].

15.bxc4 Bd6 16.cxd5 [important interpretation: Why exchange at d5 and allow the weak c6 pawn behind to disappear? It is important to know that although the weak pawn disappears, it will follow the weak c6 square, and more importantly the entrance of the white pieces (e.g. Nb5). White has the advantage of development and must prove it vigorously, until Black develops and coordinates pieces].

16…Nxc3 [16…exd5 17.Ba3!? is another important concept. If the d6 bishop disappears, all the dark squares will be weak and cannot be controlled *(17.Ne2* moving the knight to f3–d3–c5 is also strong *17…c5 18.f3 Nf6 19.Nc3)*; 16…cxd5? 17.Nb5+- Black would lose ground 17…Ra6 18.Nxd6 Nxd6 19.Ba3 with the strong threats Qc7 or Bf1].

17.Qxc3 cxd5 [The Black plan has been dismantled and the "c" file is already strong for the entrance of the white pieces. However, still no useful squares to finish off the position. It has to be able to clear the position until it obtains an entrance through the strong file so…].

18.Ba3! [Another strong positional detail. All the dark squares were weakened with the plan of opening d5-b5 and now, without the presence of the dark squared bishop, it will be even more severe.

18…Bxa3 [18…Rc7 19.Bxd6 the most simple 19…Rxc3 20.Rxc3 White has a rook and piece for the queen, but creates a new double threat in f8–b8 20…Nd7 21.Bxf8 Nxf8 22.Rc5 beginning the invasion through the file 22…Nd7 *(22…Qd8 23.Rac1 Bb7 24.Bf1* the White domination through Bb5–Rc7 is complete*.)* 23.Rxa5].

19.Rxa3 [c5-c6 and c7 are key squares for White. Already the black rook cannot dispute the file with Rc7 and higher pieces can create significant threats through c5. The Bc8 is the clear example of the desolate Black position. The bad bishop runs into the pawn structure and also cannot avoid all the white pieces seeking strong dark squares (e5, c5, c7)].

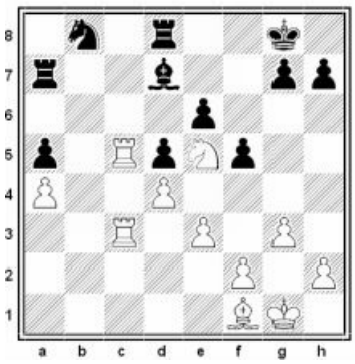
19…Bd7 20.Qc5 [the Black position collapses after the invasion and threats are multiple by dark squares (Qxa7, Qxa5, Qd7 Qd6)] **20...Qc8** [What is it going to do?].

[20…Ra6 21.Bf1 Ra8 22.Qd6 threatening Rc7 and if 22…Bxa4 23.Rxa4 Qxa4 24.Qxe6+ Kh8 25.Nf7+ Rxf7 26.Rc8+; 20…Ra8 21.Bxd5! When all the pieces are securely in position it should be tactical. This elegant pounding is finished off by the diagonal. 21…exd5 *(21…Na6 22.Qd6+–)* 22.Qxd5+ Kh8 23.Qxa8].

21.Bf1!? [Calmly a new piece is moved to the strong side attack].

[21.Nxd7 Interestingly, the exchange of the powerful knight for the inferior bishop also was very strong and winning. 21...Qxd7 22.Rb3 black knight is without squares and can be pressed, but also the transferred Rb5 wins ground on a5 or Rb6 followed Rd6].

21...Qxc5 22.Rxc5 Rd8 23.Rac3! [The erroneous opening plan has resulted in a hopeless position, without play, without development. The knight on b8 continues without being able to activate, as during the opening].



23...Kf8 [23...Bxa4? 24.Rc8+- winning material decisively; 23...Na6 24.Rxa5] **24.Bb5** [The final exchange].

24...Ke8 [24...Bxb5 was the best attempt to induce an error, but after 25.axb5! the entrance with Rc7 leaves Black without a move (25.Rxb5? Nd7 26.Nxd7+ *(26.Nc6?! Rc8* the key of Black's defense *27.Nxa7 Rxc3 28.Rxa5 Nf6* looking for a move on f2 after Rc1–Rc2–Ne4*)* 26… Rdxd7 and White should show that the advantage is enough to win 27.Rcc5 Ke7 28.Rxa5 g5) 25…Rb7 *(25…a4 26.b6 Rb7 27.Rc7 Rxb6 28.Rf7+ Kg8 29.Rcc7)* 26.Rc7! [Rxb5 27.Rf7+ Kg8 28.Rcc7].

25.Nxd7 Nxd7 26.Rc7 [The knight is now pinned and the final invasion left Black without hope] **26…Rxc7 27.Rxc7 Ke7 28.Ra7 Kd6 29.Ra6+ Ke7 30.Rxa5 Kf6** [30…Nb6 31.Ra7+ Kf6 32.a5 Nc4 33.a6 Nd6 34.Rd7! Rxd7 35.Bxd7 Nc4 36.a7 Nb6 37.Bc6+–] **31.Ra6 Nb8 32.Rb6 Nd7 33.Rb7 Nf8 34.a5 Rc8 35.a6 1-0**

B. Stopping the bleeding of ELO points

One of the most important things that you must take into account to increase your ELO is not to lose more ELO points. I myself think that it seems a truism, but what is central in this statement is that, for best play, the first thing you have to do is not play worse. If you're one of the readers for whom this book is more oriented; i.e., players rated up to 2100 ELO, your main goal should not be better knowing an opening, or delving into a certain line of play. The first thing is to stop practicing habits that prevent your chess skills from being what they should be, keeping you at an inferior level. When this happens, we will have to focus on going forward, but, as I explained, the first step to going forward is to not go back and the second step is to know where you are.

By graphically representing this principle, I will ask you to imagine that you're sailing in a boat that is sinking as a result of a hole in the bottom. Your objective was to sail very fast, and this is a good objective, but for this you need to plug that hole completely**.** It will serve nothing to paint your boat or improve its seaworthiness. Nor will it serve you to bucket out the water.

The main thing and the most important thing is to focus on repairing the structure; i.e., work on the causes and not on the symptoms.

1. What makes you play poorly? Habits to avoid

Somehow you have become stuck at a certain level and you just can't move it. In reality, what separates your level of play from that of an advanced player is actually “implementing” the decisions you make. Up to a certain point, you sometimes interpret things that are incorrect. Other times, you interpret things correctly, but implement them in an incorrect way. And another one, the worst, is that you interpret a position incorrectly and also execute a plan incorrectly. Oh, also sometimes you interpret the position correctly, but that one should not concern us now.

What do you do first of all? First of all, as I mentioned before, stop the bleeding of ELO points; i.e., stop the habits that make you play worse and habits that make you play at the same level, without seeing beyond. Let's go with this.

Blitz Games : On this point, I'll be a little radical. If you really want to progress, stop playing blitz games daily and compulsively. As entertainment, it is fine, and is even somewhat addictive and stimulating, but probably one of the activities that most hobbles your level of play. Surprised? Keep reading.

When you play speed games, you connect almost exclusively a system of your brain that can be defined as “fast” or emotional. Chess is a rational activity that requires a conscious mental effort and analysis. When we play blitz games, the “slow” system (the second mental system that we possess), that is responsible for controlling the occurrences and thoughts of the fast system, and issuing judgments and appraisals, doesn't have time to run because it is slow, and we only play using patterns and habits that we have automatically learned by way of the fast system without question, which causes a feedback effect from our automatic playing level; i.e., when playing many speed games, your brain turns to patterns (valid or invalid) that have been stored as a result of the experience that has been provided to it during practice. It does not question the usefulness of these patterns, because its priority will be to respond to the stimulus that, in itself, is supposed to be playing chess.

If you want to make progress, it is necessary that you promote the “transfer” of useful patterns from your slow system to your fast.

It is necessary to use your **cerebral plasticity** (that can generate new neurons and such that intelligence is a malleable capacity) in your favor and not against you. As well, my friend GM Herminio Herráiz said: “When playing fast you become a haphazard player rather than a refined one.”

In order to understand this concept better yet, I want to tell you that in the next few lines you'll read a question. A question to which you have to respond quickly, without doing any

calculations, letting your intuition shine. A game of chess and its corresponding case cost $7.80. If the chess game costs $7 more than the case, how much is the case? The number that has come to your mind is 80 cents, but this automatic answer is false. If the case costs 80 cents and the chess game costs $7 more, the total sum would be $8.60 (7.80 for the game of pieces plus 0.80 for the case). The correct price is 40 cents. ($7.40+ .40 = 7.80). If the total must be $7.80, then $7.40 is $7 more than .40, not .80.

Something similar to what you have experienced right now is what happens in your brain if you constantly reuse stored patterns (remember that there are useless but also valid responses) by rapidly playing blitz games.

The recommendation is: play blitz games as much as one day a week and no more.

Use a real Board to study and play : With the proliferation of chess engines we have started to become accustomed to visualizing the board and the pieces in 2D rather than 3D: that of a real board. I know of no studies on the matter, but I believe that the modification of the visual experience can change our thought processes. If we get used to training, playing, or studying in two dimensions (computer, tablet, smart phone...) some perceptual elements of the real board affect our comprehension. It is as if habituation to the 2D then demanded an additional effort to move to 3D.

The recommendation is: study and get ready in 3D.

Do not analyze your games with a chess engine without analyzing them yourself . This widespread practice is harmful. Why is that the case? At the end of a game we are very sensitive cognitively with everything that has happened in it, and this generates within our minds "fertile soil" that can absorb concepts by analyzing mistakes and successes. But so that these new concepts, ideas, etc. can become ingrained, you must put forth additional effort. This does not happen by magic or because we simply perceive the suggestions of a computer.

Transferring this effort to a machine is doing the exact opposite. It is the machine that is strengthened by you and your opportunity disappears.

When you play games to entertain yourself, play games with players stronger than you . We have a tendency to reduce our level of play to those who surround us. If you play with players stronger than you, your game will tend to rise. If you play with players weaker than you, your game level will also tend to decrease.

The recommendation is that you don't have to obsess.

Don’t overdo tactical training. Two intense days a week is enough . Training with tactical exercises and puzzles is very useful. It helps us “resharpen our skills” and is effective when practicing for actual matches. But abusing yourself daily with this activity does

not provide proportional improvements. In fact, one can end up becoming a kind of “problem-solver”, while completely losing touch with the reality of the game.

Despite this, you will see that in the training planning that I propose to you, that they appear in the 10 or 15 initial minutes of some training sessions. The objective is not specifically to prepare you tactically; it is to prepare your brain for the work that comes later. We could say that it is a warning to the chess player.

2. Your inner voice: that paradigm. How to change it?

It is frequent, in beginner and intermediate levels, and in those of pre-advanced levels, that they face the game with luck of the “inner voice” --- a voice that we don't hear, but that narrates to us and influences us regarding how we must face the positions and the game in general. This is something very human. As we explained previously (we repeat the text here): **Decisions are not dictated by a function of state. What does this mean? The human does not take a position without taking into account everything that has happened previously as a computer does. Previous plans and decisions affect their assessment of the position, whether it is correct or incorrect. The less time, the greater weight the past has.**

The problem arises when that voice that “comes standard”, is replicating in all our games, calling us to: “always attack”, “always play positionally”, “always look for tactical complications” or “always try to simplify the position”, etc.

Although it is difficult to develop a universal style and we all have a certain tendency to play a certain way (that is what determines our personal style), to maintain the repetition of these messages, game after game, continuing not to analyze the positions in the most objective way, means that our schemes of thought are altered by those “cognitive dogmas.”

To try to correct this deficit, I propose a tool that aims to progressively erode this model into which you have settled. It won't happen overnight, but what is a certainty is that it will provide you with experience as a clearly different player with great potential.

We will analyze this tool in the section “**The seven keys to play better.**”

C. Playing better

1. To study chess is not to train in chess

Once you have understood the nature of the game of the chess and you know that it is more important to repair the structure than to bucket out the water or that to improve the navigability of the boat (and that which you are going to put into practice), we must begin to speak about how to play better.

If you want to increase your ELO or simply to gain more starting off, although you do not

play official matches, necessarily you will have to play better. This is one of the important points of The Zugzwang Method.

Thus exposed, it is an unrestrained truism, but it has an important background. **One of the mistakes most repeated in intermediate level players who intend to make progress, is devoting time simply to studying chess**. Studying chess one can "know" more chess, which undoubtedly is positive, but if we dedicate ourselves solely to it, we skipped an important part: the pure training, that effort directed toward harnessing the abilities necessary to play better and that does not involve, necessarily, "knowing" more chess.

I am in agreement with the affirmation that, in one recent interview, the player and Grandmaster Sopiko Guramishvili told me: "*Everything that you study or you train for, be that as it may, you will come to do well.*" But when we try to optimize our progress, and when our time is limited, we can be dedicating too many resources to aspects that are going to provide us with an improvement of very little significance. In fact, I consider that especially the beginning and intermediate level players, rated between 1600-2100 ELO, can benefit from training specifically to play better and not to know more. I will try to explain it through a very graphical example.

Suppose that you are a professional runner and want to improve your ranking or get an award, etc. and instead of training and running on the track, you only watch videos on technique, study books on how to tread better, etc. Probably, after all this, you will have learned that it is important to take longer strides, that good posture reduces vertical oscillation and that both aspects will make you run better. But if you don't go down to the track and you don't sweat, all of the previous will not matter.

Must we then avoid studying openings, theory of endgames, reviewing games of grandmasters? The answer is no. **What you must obtain is that balance between your training (I will call you from now on to harness the ability to play better) and your acquisition of technical knowledge.** Why is that the case? If we solely dedicated ourselves to improving our technical knowledge, we could become good chess theorists, but hardly good players. And, on the contrary, if we spend our time only in training, we will be leaving on the wayside a very important part also, since all the theoretical knowledge works like a kind of inner maintenance. If we used the analogy of a machine, the training would be the oil that lubricates the bearings and the technical knowledge (endgames, openings, strategy, maneuvers…) would come to reflect the quality of those bearings: if their size and materials are adequate. It works like this.

Previously, it was explained what makes us play worse; that is to say, those habits that cause a decrease in our abilities. Next to these habits, fundamentally the tactics and computational mistakes are found, the presence of which is greater as we descend through the ELO scale.

In this section, on the other hand, I will explain what it is that you must do to play better. It is

something that is going to help you make the computational and tactical errors diminish. Remember, we are not talking about knowing more chess nor being an expert in a line of the poisoned pawn of the Sicilian defense; we are talking about playing better with the chess knowledge that you already have. This is what it's all about. Therefore, to take your level of game to the limit that your knowledge of chess determines. Knowledge we will concern ourselves with later.

What are the keys?

- You must carry out **active training**. This is very important. This means that it does not serve you well to know why a grandmaster makes a brilliant move. It does not serve you to understand this nor to memorize it to perfection. You must be one who makes an effort to exercise your capacity for calculation, your spatial vision and your general mental agility. The examples of previous games that we have seen have improved, minimally, your knowledge of chess, but they have not exerted any influence on your capacity for calculation, nor your mental agility.
- **Training** must be consistent from the point of view of the dedicated time or, if it is possible for you, **progressive**, better still. I mean that, at the very least, you must dedicate time every week, and if you can, be increasing in dedication. In general, the more you train and study, the greater the level you will achieve (although there are exceptions that I will address in other points).
- It is much more beneficial that you dedicate 30 minutes every day or one hour every two days than 10 hours in a single day. **Consistency is fundamental**.
- This training should be primarily in **calculation of lines and tactical positions resolution**. I will explain later how to carry it out and at the end of the book you will find a 10-week plan.
- The **balance,** which I consider **suitable for training** with respect to the technical knowledge acquisition for a player whose ELO is between 1600 and 2100 ELO is 60%-70% training and 40%-30% endgame, openings, preparation, etc.

NATALIA POGONINA TRICK FOR THEZUGZWANGBLOG:

"Normally people take the easy path and do what they like more: watching DVDs and programs, solving tactical missions, working on openings, playing Blitz, etc., but, meanwhile, the things that they like less are probably the areas where their main weaknesses reside. For example, if you think that the endgame is "boring", it is unlikely that you will become a strong player. In the same way, if you think that combinations are only "cheap tricks" and that only a deep strategic game is important, we will be speaking of those who are prone to continue losing "unfairly" and they complain after the games."

2. The seven keys to play better, in order

a) How to think correctly and effectively

Thinking correctly does not mean thinking "rightly." One can think correctly and be mistaken, and also one can think erroneously and guess right, although this is much less probable. But one or another way, I defend that it is far better to follow a method than not to follow one at the time of thinking.

As outlined in “Your inner voice, that paradigm”, the less experienced a player the greater the tendency that this inner voice guides thought processes. I will use an extreme example so that this point is understood well: the children who are learning try to devour the pieces of their opponent without taking into account any kind of consideration, avoiding any type of strategic threat or fiasco. Their argument is: “You have to devour the pieces of your opponent”, and any decision that follows and (according to them) guarantees said objective will be a valid decision.

As the player moves away from that level, he/she begins to consider the direct threats of the opponent, but not so much the more-indirect ones. At a later stage, they take into account all threats. In addition, the player is already able to perceive the plans of their opponent (not only the isolated moves) and to contemplate them like a set that he/she must integrate in the totality of its plans. This last player is experienced and the one that plays more accurately. Not only is he/she able to design complex plans, to have a great abstract reasoning and good strategic knowledge, but designs his/her plans from the prediction of the plans of the opponent, which increases the possibilities that their plans do not fail.

By all the previous information, I want to propose a simple method that will help you with organizing your thought and beginning to think in a more effective and efficient way every time.

First step. After the move of your opponent, always think about what the threat of such a move is. You very premeditatedly do not allow yourself to respond in an automatic way. Dedicate some time to thinking about what the real threat is. The threats can be totally evident, like when your opponent threatens clearly to take a piece but, many other times, there is nothing clear, and there are even occasions when it is very, very difficult to discover what your opponent "is up to.” But exercise this ability. I would even say very radically, so you understand the importance of this point, which must be considered as a mistake if you move without having previously questioned this. And you get what you deserve when you play like this.

Second step. Determine if the threat from your opponent is valid or not. In this second step, once “we have discovered” the direct intentions of the opponent's move, we must evaluate if this threat is valid or not. That is to say, if this threat is potentially

dangerous or not. The person against whom we play is not perfect, designs inexact plans, objectives that strategically may not be sound and, as we have discussed previously, is often mistaken: the importance of the error.

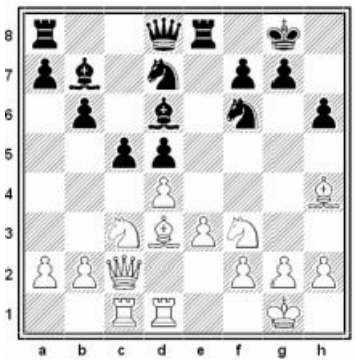
All of that aside, it is important that you do not react automatically to the threat of your opponent. Ask yourself. Is it real? Must I avoid it?

Third step. Analyze how the position has changed . This is not time to begin to elaborate plans nor to decide how to play. Again, it is necessary to become familiar with the evolution of the game and to distance ourselves from our previous thoughts. What are the consequences of my opponent's move on the position? Has he/she ceased to protect some square? Has some point been made vulnerable? Does there exist a smaller reinforcement in some place of his/her structure? Has this opened up a line that did not exist before?

All moves, regardless of what they are, and whether played in the first stage or in the last one of the game, are going to modify the position. This is very related to the nature of the chess. Chess is not reversible. You can't switch it into reverse. You can't go back. Each move modifies more and more the position as if it was the evolution of a biological being, and this allows constructed relationships between the pieces, the squares, and the files… To understand these relationships is fundamental to playing better. But not only that, the key is based on training over and over the habit of thinking this way.

The best players have integrated this habit; they do not think about anything else when they see the move of their opponent. It is something instantaneous. It takes a very short time to perceive what has happened. But in order to do this you must practice this incredibly vital resource recurrently.

Observe the following position and values of the Black move c5. Is it a threat? How does the position change? How does it benefit you?



Abarca, X. (2000) - González Seguillo, O. (2107)

Sants, 2015

13…c5?? [An error that initially could go through ignored, but that condemns the position. The Black opening without c5 would be perfectly playable. Nevertheless, the downfall of Black is swift. Why is that the case? What are the consequences of this move?

1) Black opens up the position in light of better-developed and very centralized white pieces that can press the Black center.

2) The pressure on files “c” and “d” is very relevant, and to this the pinning danger of the f6 knight join the mix.

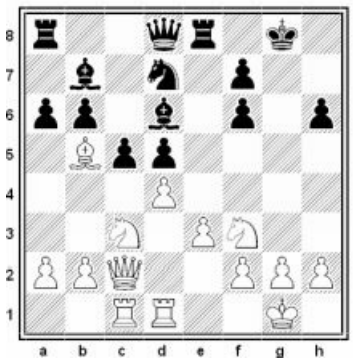
It is evident that Black should maintain a little more closed play to precisely finish the development.

As at the moment of this error, White must locate exactly where it can damage its opponent and take advantage of the lines opened for attack.

[13… Qe7 was most natural and calm. The rooks are connected, the queen on f8 can have a defended position and the position is only slightly inferior].

14.Bb5! [A great decision. It seems that the bishop was well placed on d3, but the h7 square was not a serious weakness, since the bishop on d3 was in front of the queen and not queen in front of the bishop. White takes advantage of the diagonal opened for the transfer to a better location. Those pinned now are doubled, and it is not easy to solve the double attack on d7 and f6. In addition, file “d” is cleared for the rook, so d5 is also an important weakness. As we see, several weaknesses are added and, therefore, defense is very difficult]. [14.dxc5 would be similar after 14… bxc5 15.Bb5; 14.Bf5 was also strong, but why not pin the two knights simultaneously like in the game?].

14… a6? [Oblivious to the concrete threat of White (i.e., doing exactly the opposite of what it needs to do), the second player makes a new mistake that can completely condemn its position] [14...g5 seemed more sensible although the approach remains gravely damaged **15.Bxf6** [the double pinning of the knights seals the game] **15… gxf6** [the moment for finishing off the position arrives. Not only is calculation key, but also clearly understanding of the Black weaknesses] [15…Nxf6 16.Bxe8 Qxe8 17.Qb3].



16.Bxd7! [Another swap that benefited White. The knight was key for the defense of the weaknesses of b6 and c5 **16…Qxd7 17.Na4** [it cannot defend both points at once **17…Qc7 18.Nxb6!** [Most forceful] **18… Qxb6 19.dxc5 Bxc5 20.Qxc5** [after the combination, with a sequence of exchanges, not only has it gained a pawn, but the Black position is positionally disastrous. The bishop is bad in light of a strong knight on d4. And the Black structure is full of isolated and doubled pawns].

20…Qxc5 [20…Qxb2 would lose new material 21.Rb1 Qe2 22.Rd2 takes the bishop]. **21.Rxc5 Rac8 22.Rdc1+–** [it is evident that the earlier mistake made by Black with the rupture… c5 and the later mistake… a6 has been punished hard, and the position has collapsed after this erroneous plan. Black opened up the position without having prepared its pieces for the fight, and it could not restrain the activity and attacks of the opponent's pieces] [22.Rxc8 Rxc8 23.Nd4].

Fourth step. Analyze the position in the most objective way possible. Once you know the intentions of your opponent and how the position has been modified (possibly many of the consequences of the opponent's move have not been looked for nor could they have been avoided), the moment arrives in which you begin to think from your perspective; that is to say, what is the plan that you must devise and what is the best way to execute it.

In the execution, it is going to have a direct influence over "how well you play." We have talked about them previously: ability of calculation and visualization, tactical capabilities, mental agility… But in planning, the knowledge that you have in chess is going to have greater weight. Therefore, it is so important to take care of the two areas, since both are bound inviolably.

Fifth step. Devise a plan . Once you have made a diagnosis of the position, the moment arrives for carrying out the details of the plan. How do you draw up a plan?

- Know in advance the typical openings that you play because everything you do has been done before, all problems that arise have already been thought about and resolved by others, so rather than doing it again, study what has already been done.

- Base your plan fundamentally on the types of center that exist and study them. Remember that five types of center exist: the opened, closed, static, and dynamic center in which a player has pawns and nothing else.
- Direct your plan of attack in a certain direction.
- Seek to develop the plan in the most linear form possible whenever you can. This means that you do not let yourself get distracted by the moves of your opponent. You must take them into account but, as I explained to you, whenever it is possible execute your plan step by step.

Sixth step. Move . Only after having carried out the previous steps should you move, and not before. The act of moving should never be a reflex. Even the most obvious move should be integrated into this scheme and be evaluated. I speak primarily about recaptures.

And another important element of this sixth step is that your move must always pursue an objective. We are reassessing plans with each move, but any move should go chasing a target. You do not move to move, nor castle just to castle. Position your moves within a master plan. Top players seek to meet "mini-objectives" within an overall plan, maybe that the opponent can adequately oppose, but they always move with an idea in mind.

(b) The two most important secrets to advance

Previously we saw the importance that playing active chess has. We said: "**Passivity generates weakness**", but not only is this principle true, but also this one: "**Weakness generates passivity**"; i.e., weakness and passivity in chess are concepts that work together. Now, you mustn't interpret this "law" categorically. Having your weakness, you have to play passively. The relationship between weakness and passivity is relative, not absolute. It depends on other factors such as compensations.

Imagine that you have a weak pawn in a determined position, but, in return, you have a powerful initiative that is compensating for this weakness. The weak pawn will exist and objectively will have this condition, but will not be revealed by the global balance of the game; i.e., because of other elements (safety of the king is the most influential of all) that conceal this weakness.

Limiting the forces of our opponent, constraining them and making them occupy unsuitable places are some of the best ways to take it to the dreaded passivity. **A passive opponent is a vulnerable opponent**. This statement is very well linked with the concept of "internal argument." When we overcome and surpass our "interior dialogue", i.e., those dogmas or categorical instructions like "Always attack the king", "Never risk anything", we become players able to cope with the game from another point of view, which is well aware of this "secret." And we can “feel” that it is possible to win, leading our opponent to uncomfortable positions and

causing their mistakes without having to checkmate them with a bayonet attack.

Throughout the history of chess, there have been real specialists in this art: Capablanca, Karpov, Kramnik... Their games, as we shall see, give us very rich examples of seemingly innocent moves that were in fact conceived of a great complexity and positional understanding.

In which case is our opponent going to feel limited and passive?

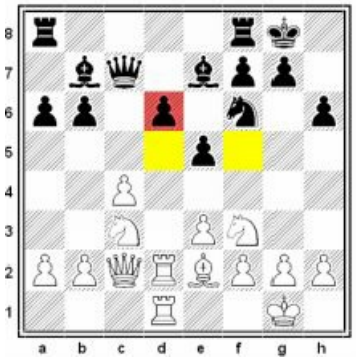
- When a piece is tied to the defense of a weak point.
- When a piece is pinned.
- When the strong points are occupied or defended by our pieces.
- When lines open (files or diagonals, and to a lesser extent horizontal lines) they are dominated by our pieces.
- When we generate pawn structures that restrict the activity of their pieces, for example, in a closed position of the bishop and pawns against knight and pawns, in which the Bishop is trapped under the pawns of the same color.
- When the movement of their pieces is "physically" blocked. In this case, obstruction is not preceded by the attack on a square, but by the occupation of a space that prevents the development of a piece.

Here's a good example:

Svane, Rasmus (2445) - Hambleton, Aman (2509) [E38]

Oslo Chess, 2013

White's move. Take a few minutes to analyze and familiarize yourself with it.

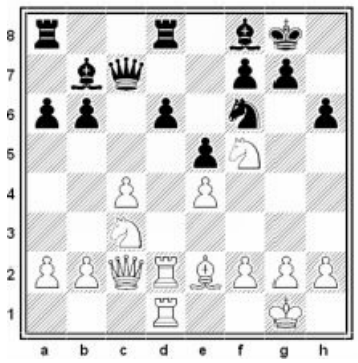


17.Nh4 [the Black position defect is that now g6 is not possible. So the knight is strong on f5] **17...Rfd8** [no choice but to defend in a **passive** way due to the large amount of weakness.] [Not only d6 is weak; also the f5 and d5 squares are key to the White pressure].

[17...g6 this defensive resource to avoid Nf5 is not possible by the demolition of the rook, which follows 18.Nxg6 fxg6 19.Qxg6+ Kh8 20.Bd3! moves more pieces to attack and Black does not have space for defense *(20.Qxh6+* allows Black to move pieces to the defense and

reorganize *20...Nh7 21.Bd3 Rf7)* 20...e4 (20...Bd8 fails to...21.Qxh6+ Nh7 *(21...Kg8 22.Bf5* and white pieces pass to attack with Be6 or Rxd6–Rd7 *22…Bc8 23.Rxd6 Bxf5 24.Qg5+ Kh8 25.Qxf5 Qxc4 26.Rxd8)* 22.Bxh7 Qxh7 23.Qxf8+) 21.Nxe4 Bxe4 22.Bxe4 Nxe4 23.Qxh6+ Kg8 24.Qg6+ Kh8 25.Qxe4 advantage is more than evident. Not only have four pawns been captured, but in addition, the rook can move to attack with Rd5-Rh5].

18.Nf5 Bf8 19.e4 [the White plan has been satisfactory. Key points f5 and d5 are now consolidated, and the knight gets a good circuit to reach d5 via e3].

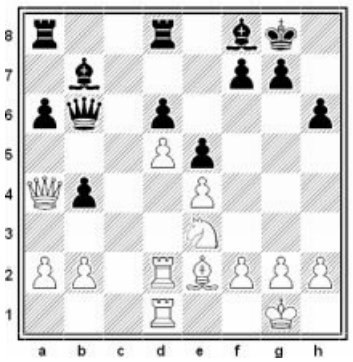


19…b5 20.Ne3 b4 21.Ncd5 Nxd5 22.cxd5 [c4 strong square, the f1-a6 wide diagonal and two black bishops without mobility provide great advantage to the first player. The Black position is reduced to passivity and trying to resist inactively. White has begun the invasion of the Black side, taking advantage of the open file].

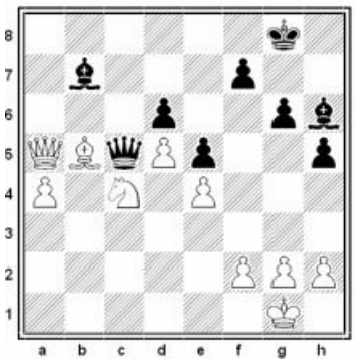
[22.Nxd5 was also advantageous, although White prefers combatting both bishops and avoiding the possibility of entering into an endgame of bishops of a different color, which may raise options for defending the draw. 22…Bxd5 23.Rxd5].

22…Qb6 [22…Qxc2 the endgame is also inferior for Black 23.Rxc2 Rdc8 24.Rdc1 Rxc2 25.Rxc2 Rc8 26.Rc4 Rxc4 *(26…a5 27.Rxc8 Bxc8 28.Bb5)* 27.Nxc4 and the invasion of the knight by a5-c6 will win at least one of the black pawns. The bishops are still passive and without diagonals to activate].

23.Qa4 [still controlling the Black weaknesses and preparing the Nc4 jump].



23…a5 24.Bb5 [24.Rc2 is more precise, ahead of the opponent's plan 24…Rdc8 25.Rxc8 Rxc8 *(25…Bxc8 26.Qc6 Qa7 27.Bb5)* 26.Nc4]. **24…Rdc8 25.Nc4 Qd8 26.a3** [26.Bc6 moving by the light squares again was the idea, but now Black can free itself 26…Bxc6 27.dxc6 Qc7 28.Nxd6 Qxc6 29.Qxc6 Rxc6 30.Nf5 Rc4] **26…bxa3 27.bxa3 Rc5 28.Qb3 Qc7 29.Rc2 g6 30.a4 Rc8 31.Rdc1 h5 32.Ne3** [Black has not countered on time, and the final phase is prepared to take advantage of new light squares and bad position of the bishops] **32…Qb6** [32…Bh6 33.Rxc5 dxc5 34.Rd1 last pawn and multiple weaknesses on a5–c5–e5 are enough to put Black in trouble 34…Bxe3 35.Qxe3 c4 36.Rc1 c3 (36…Qc5 37.Qc3 *(37.Qxc5 Rxc5 38.Rxc4)*) 37.Bc6 and the pawn is captured 37…Bxc6 38.Qxc3] **33.Rxc5 Rxc5 34.Rc4 Bh6 35.Qc3 Rxc4** [35…Bxe3 36.Qxe3] **36.Nxc4 Qc5 37.Qxa5** [finally, the weaknesses fall and White imposes its advantage].



37…Bc8 38.Qe1 f5 39.Qa5 fxe4 40.Qd8+ Kh7 41.Qxd6 Qd4 42.Qc7+ Bg7 43.Ne3 Qa1+ 44.Bf1 Bf5 45.d6 1-0 [This game has been a clear example of how you go about taking advantage of the weaknesses of the opponent, and the importance of increasing these weaknesses to create new advantages, with the aim of reducing the enemy to a passive game and no hope for real counterplay].

(c) Active learning

When a child is born and starts to develop it cannot take classes on how to walk and how to brush its teeth. Children are doing, thinking, exploring, through interaction with their environment. Everything is a building block for the construction of the abilities of each child. These continuing challenges to learning, focused on its own experience and based on previous experiences, are key to its future.

In the same way, this applies to the player who want to improve. Active learning is, simply, "learning by doing." Air pilots know well the difference between learning actively and passive learning. Their passive learning comes through listening to the flight instructors and reading the flight instruction books. Active learning actually comes from flying. Books and instructions are necessary: you must know what a double attack is and how it is produced. You should know the risks of having your king on the eighth rank without defenders... But you only learn to fly and operate an aircraft of greater complexity (positions) if you hold the controls of the plane by yourself.

You can have the opportunity to work with the best chess master, who is a great teacher and a brilliant player, but will only play better if you take responsibility for your learning, carrying out a planned activity and continuing personal effort. **Active learning is based on the student, not on the teacher.**

This type of learning also is a directional process. Ideally, you can have someone guide you or your work plan (at the end of this book you will have a fully optimized 10-week plan). In passive learning, the teacher imparts the lesson and expects the students to retain. But in active learning you are the one who engages to discover the lesson. You know what should work, but in the end, the lesson is built in your mind. It becomes self-explanatory. This generates an exciting experience in which you, over time, begin to discover chess position nuances or aspects that you never thought could exist. It is a very enriching experience and that payback will come after weeks of practice.

All I explain to you is the result of my experience as a player and as a teacher, and I myself have experienced the highest growth of ELO when I respected these principles. But I would also like to support these explanations with an interesting study:

Scott Freeman is one of the authors of one of the most conclusive studies that has been done on active learning. The study was conducted with a sample of students in science, technology and mathematics. That is, the disciplines of the ability to calculate and abstraction have a very significant weight, as in chess. In this paper they compared the exam results of various groups of students: some had been taught in a conventional manner (passive), and others were actively involved. In total, they obtained 228 tests to compare. This is what they found:

- Students in a traditional classroom course are 1.5 times more likely to fail, compared to students in courses with active learning.
- Students in the classes of active learning outperform those in traditional conferences in identical tests.

Both results were incredibly strong. They were made in various disciplines, in large and small classes (although the impact of active learning was greater in small classes), and were carried out at beginner levels, as well as higher level courses. The performance results also demonstrated regardless of how students were divided in the two groups, if the groups had the same or different instructors, or if the student was assigned to a random group or not.

> "*Students learn what they care about and remember what they understand.*" (Stanford Clark Erickson).

See, active learning is the key and essence to playing better. It is very important to understand this principle. Yes, you can learn more chess passively, but it is very difficult to play better if you do not engage in a planning exercise.

d) Internal review: the extraordinary effectiveness of analysis of our games

Internal criticism or review is a constructive self-assessment process in order to advance our knowledge and skills. Playing better, as we are seeing, requires enhancing our skills, but also requires minimizing most of our shortcomings. We saw earlier when we talked about "stop bleeding ELO points."

For this to happen, it is essential to be conscious of who you are as a player and know what your weaknesses are. And this is where the analysis of your own games comes into practice.

All authors, including the most prestigious (Dvoretsky, Yusupov...) place a strong emphasis on the importance of including this activity in our preparation. Through it, we need to be aware of technical aspects that we need to improve, but also psychological aspects.

The best way to analyze a game is to do it with a person who has a much higher level than you and also knows how to guide you in this process. But this is also the most expensive system economically and not everyone is able to devote those resources to their preparation. For this reason, and because this book is targeted at people who will see to their own education, I will explain a very useful scheme for you to analyze your own games. Later we will see how to incorporate this study in our weekly preparation.

Preparation : Prepare two databases, one with the games you have won and the other with the games you've lost, so you can focus your work easily.

First : Whenever you play a game, annotate it. And on the score sheet mark these two bits of data: the time it takes to make every move and make a mark in those positions that you

yourself consider critical and have difficulty playing them. Those are moments of the game in which you feel stuck and have doubts. Doubts may arise on plans or difficulties in implementing a plan; that is, you have a clear plan and trust it, but when carrying it out you find that you're unable to calculate it. Remember that in the spreadsheet you cannot make annotations, if you put a little mark, it is fine.

It is also advisable to have a record of what brought you to the game after playing it; it will be very useful for analysis later, but so will the time months after you return to see your ratings. If you are evolving you will be surprised when reading what you wrote. Some authors recommend this practice right after the game. I prefer to do it right after the game and a few days later when you've already been able to observe it in perspective and not feel so influenced by the moment.

What information should you register?

- Your valuation in the various transitions. For example, at the end of the opening you will have a conclusion of how you arrived at the beginning of the middle game. In your opinion, did you have an advantage? Were you equally matched? The position? Why?
- Critical positions and critical moments. That is, it signals at which times of the game did these types of positions occur (later I will explain the difference between them).
- The sensations experienced: Were you afraid? Were you elated? Did you feel distrustful?

Second : It's time to get to work. Start playing the game and analyzing the opening. Contrast the way you play it with those of grandmasters. What point did you leave on the recommended lines? Did you respond adequately to the derivations of your opponent? Did you have clear theoretical plans or did you digress to doing simple “natural” moves? In the opening two things can happen:

- **That you played on a known line.** In which case the game will provide less information, but it can serve to reinforce your knowledge.
- **That you played on an unknown line.** In this case, you must study plans and maneuvers that are behind you, leaning on databases. You have free databases online, such as http://chess-db.com/public/index.jsp or, if you can afford it, work with the database ChessBase Megadatabase) data or chess books.

After studying the opening it is the time to begin to analyze the moments and critical positions that you determined in the first step. Analyze, without the help of chess engines, if your assessments were correct, and also try to find alternatives to the possibilities you considered and develop these lines out to the end.

The endgame phase is usually one in which most errors occur due to the time troubles but, although this has been the case, do not miss the opportunity to train on the position in which you

lost the game or one in your opponent lost. What would have happened if he had played correctly? It is also the time to incorporate, to your repertoire of endgames, new knowledge. Fortunately, the good books of endgames offer examples that can be studied fairly closely to the positions that occur in practice. If, for example, you entered into a pawn endgame with bishops of different color, study the characteristics of the endgame...

Third : Make a quick scan of the entire game with a chess engine with the aim of finding errors that you have not been able to detect in previous entries. Some of the best free chess engines at this time are Fire 4, Equinox 3.2, Critter 1.6a, Bouquet 1.8, Black Mamba 2.0.

These errors can be of two types:

1)Fatal errors are those in which the engine states a value change of more than one point. Your game should assure that in none of these fatal errors appear there. But in the event that you encountered any, ask yourself why it happened. And above all, and most importantly, where was your attention at the time of the play: Were you influenced by previous moves? Were you too focused on a specific goal that you let a detail slip by you? Were you pressed for time? Why were you pressed for time? Perhaps you played as a perfectionist previously? Did you have difficulties in the previous phases of the game? It is very important to ask these questions, because thanks to them you will discover patterns that led to your thinking with an opportunity (or not) to repel the threat.

2)***Basic errors*** : those moves that, putting the outcome aside, could be better. In this, the computer helps us with some difficulty, thinking that the machine is programmed to give a mathematical evaluation of any position and that a difference of 30 or 40 hundredths sometimes is not too important. In addition, if the position is not too clear, it will take some time to analyze in depth and with some reliability while it is offering valuations (never trust 100% in the result that is offered to you by the chess engine and, if you want to analyze a position with certain guarantees, let it "think" at least five minutes).

As a general rule, and if you're not an expert in computer analysis, basic errors are considered those moves in which the computer returns a value for another move of plus or minus 0.50. Less than this amount should not worry us too much.

Fourth : Fully analyze the basic errors and analysis that you yourself provided on the second point. You can help yourself by running two chess engines simultaneously, so you can compare two different "points of view." For example, a good combination may be the Komodo engine, which is an excellent engine, characterized by being programmed to provide human-like game play, and Stockfish with huge tactical ability and A.I. force.

The system is not to believe what the chess engines tell you. It is you yourself who advances through the engine by the different lines until the advantages that are palpably detected manifest

for you and that you yourself can interpret and evaluate the line from the beginning, starting from the endgame. Only in this way will you understand the spirit of the moves.

Once you implement this reasoning, you should also conduct superior analysis; i.e., no longer considering moves independently, and rather yourself as a player. Understand that behind every mistake there is always a deficiency, and this deficiency is that on which you must work. Ask yourself if these shortcomings are repeated in different games: Are they... errors of calculation? Failures of dead positions for which you should create strategic plans? Would you always play the same opening schemes regardless of how your opponent moves? All these issues will help shape your self-concept as a player and will be the basis of all your work.

e) System

Our resources and our capabilities benefit from management of the learning process. Studying chess randomly without following a system will provide some benefits, but you will not do it in the most efficient manner.

Having a study method is like having a plan in chess: it is preferable to have a bad plan than none at all. As happens in a game of chess, we must be flexible and go forward, adapting to the context. As we go about executing, conditions change, the effects we anticipated occur or not, and when they do occur, they sometimes arrive in intensities we could not foresee.

In addition, here the Pareto Principle is fulfilled.

HISTORICAL NOTE

*Vilfredo Pareto was an Italian sociologist and economist of the last century (he died in 1923) who noted a curious rule, which today seems to have re-emerged in the analysis of numerous disciplines and sectors of our society. Pareto observed that people in their environment naturally divided between "**a little of a lot** and a **lot of a little**" divided into two groups of approximately 80:20 proportions such that the minority group, consisting of 20% of the population, held 80% of something and the largest group, comprising 80% of population, 20% of something.*

This 80/20 rule seems to be applied in virtually all fields in which we test and has been studied and demonstrated many times by statisticians.

At your level it is better to focus on those elements (20%) of what you do, as this will provide 80% of the results. Once we've reached this point, we can go on to improve the remaining 20% that we will demand 80% of the time.

For example, a study shows that rook endings occur in 8.01% of games, while the bishop against knight (which are the next most common to appear in practice) ending occurs in a surprising 3.09%. Far from first place.

It does not serve this example to discard anything that does not appear statistically in practice, because the game of chess works as a whole and knowledge can be applied transversely. Namely, a person will probably play more accurately in a middle game with minor pieces if one knows the subtleties of the minor piece endgames than if one does not know.

Now, what **principles** must our system follow?

- It should be **motivating** and emotionally appealing. There is no point having a technically perfect plan if it is not aligned with our motivations to carry it out. An improvement plan should be geared to the needs that truly mobilize the student. There is no point in setting goals for needs that you have, based upon how well they work for others.
- It must be **progressive** in both job complexity and quantity.
- You must fulfill the **Pareto Principle**. That is, focus on that which, with less effort, provides more results.
- It should be **monitorable**. The results should be visible.
- It should be **universal**. Orienting the study to all elements of the game, since chess technique has a traversing applicability; that is, the knowledge you have in a particular area of chess may be indirectly used in other areas/input that are unrelated.
- **Suitable resources**. Within the resources, time is incorporated, not just material. The plan must be adequately demanding, but must be fully integrated into your everyday life. If the plan ends up meeting daily disorganization, it will fail.
- **Realistic.** We'd all like to play like Magnus Carlsen, but setting goals that are unrealistic is bound to discourage us. This does not mean that we should not be ambitious. A good training plan can catapult your ELO level if you are consistent and applied. Of course, you need to be realistic.
- **Planning by Relationship.** That is, the content and order of our study should be planned taking into account all of the materials, and these will be sorted as they relate with each other, in terms of both time and complexity. It seems very difficult, but do not worry. I'll explain this in the chapter "Setting goals: a 10-week training plan."

f) To improve the calculation of sequences

To improve chess calculation is to avoid having to utter a phrase that undoubtedly you have heard in a tournament: "I had the game won, but I lost by a miscalculation." Sometimes, we hear something worse than it like "I had the game won and lost because of time", which often amounts to a disguised form of not calculating correctly.

Today many books are written about openings or general knowledge in chess. Calculation is something like the poor brother of tactics. While performing questions of tactics and looking for

checkmate combinations, it can be something we require and even a challenge of our preparation. Trying to improve our calculation in positions where we do not know what is happening very well can become a rather tedious task. Calculation is not easy and it is somewhat heavy, but improving it provides incredible results in your playing strength.

Calculation is a part of the chess technique. Sometimes, we think grandmasters are endowed with an exceptional capacity for being able to calculate, and this is probably partly true that they do have better cognitive resources than other players. But it is no less true for any professional player who spends a lot of time preparing by exercising his or her visualization, spatial vision, the ability to deeply understand, in the midst of complex sequences, what is happening on the board.

Rule number 1: Persistence **.** There are many historical examples of persistence. What separates success from failure is persistence. You must be clear about what you expect from your game to know how to proceed. Once this is done you should ensure that your preparation meets these ideas. It is something we already mentioned in the previous chapter. If you're not purpose-driven, then rambling thoughts govern your action, and it will be difficult for you to direct it toward the goal you've marked for yourself. **Calculation benefits incredibly from persistence.** Training in an isolated activity, doing it without evidence and without planning, just becomes a temporary stimulus.

Want to really improve your calculation? You have to be persistent.

Rule number 2: Learning **(again).** The calculation of sequences is probably the part of training in chess that requires even more than learning that is performed actively. I will elaborate that which is already exposed in the section "c) The active learning." I distinguish three basic forms of learning chess:

- ***Passive Learning*** : It is playing games, repeating opening sequences, watching videos where they explain how the grandmasters play. In short, we open our eyes and information flows before them. It is useful for the acquisition of criteria, methods and fixed rules for dealing with known and recurring situations. This type of learning, to a lesser extent, also has a memory component because without understanding or memorizing content relating to our previous knowledge, we cannot find meaning in the content.
- ***Pseudo-passive Learning*** : It is produced, for example, when analyzing our own games. It is a kind of discovery learning, in which we are able to discover the

concepts and relationships and rearrange ourselves to suit our cognitive schemata, thought. It is extremely useful to correct acquired habits and to become aware of our deficits. For some authors like Dvoretsky or Yusupov, this is the key to improving in chess. It is the area where a good coach can help.

- ***Active learning*** : The most tedious of the three, but very productive in the mid-term. In this case, the person who wants to improve has to be cultivated. Just as if we were runners, striving to overcome our shortcomings to get to the finish line, so it is with our computing capacity. We can watch videos that teach us how to better our footwork, how to breathe and keep the pace of a race, and we can become true athletic theorists. But to run better, you need to exert effort and practice. Thus, we do not acquire a greater knowledge of the game, but we incorporate important skills that allow us to play better, such as mental agility, self-confidence, less fear of risk, creativity, better management of time trouble.

  It is, therefore, facing the board, exercising and checking solutions only after trying for at least 10 minutes and never more than 20.

Rule number 3: Consistency**.** If persistence is the habit of not giving up, consistency is the habit of maintaining lifelong learning. We have already talked about it: it is preferable to spend half an hour of practice every day, every other day, rather than "binge" exercise for eight hours in one day. Specifically, regarding the calculation exercises and tactics; that is, to solve problems in which something is happening and you have to find a "good solution." Many preparers of international prestige such as August Livshitz recommend not practicing more than two days a week. Not because it is negative, but because no significant improvements were found when done daily. The rest of the days, you can devote to preparing endgames or openings. However, I will speak specifically of planning at the end of the book.

Rule number 4: Perform inverted exercises**.** What do they consist of? I call them inverted exercises when you try to solve a calculation while, for example, playing White, with the board placed in the position as if we were playing Black. In this way, we will better develop the defensive calculation, although we find it more difficult to find the right sequence.

Your calculation will soon greatly benefit, respecting all the rules above, and you'll see that immediately, you will begin to see results in your games. It's just a matter of developing healthy habits and being disciplined.

TECHNIQUES TO IMPROVE CALCULATION

When is it necessary to calculate?

In any position, whatever it is, it does not matter whether the most complex in the world or the simplest, there is always a decision we have to make: if it is necessary to calculate or not. Although it seems obvious, it is not always so. Before starting a calculation process, we must decide whether it is really necessary. The calculation is one of the activities that consumes resources in a chess game, as much in game time as in our capacity. Calculation generates more fatigue than positional evaluation, because it is less natural for a human. Humans do not have a mind of silicone as machines do and our resources must be used with maximum efficiency, defined as the result of dividing our efforts by our results.

> *"Do not calculate complicated sequences unless completely sure that it is necessary" (Mark Dvoretsky).*

Also, the decision of whether or not it is necessary to calculate precedes the election of candidate moves.

Once the procedure is understood, we must go a step further, and explain, in order to understand this tool, what chess strategy is as opposed to calculation.

Strategy is the ability to assess a position and formulate a plan. And planning is the process by which a player utilizes the advantages and minimizes the disadvantages of his/her position in order to achieve an objective. Planning is always based on the diagnosis of existing features in a position. Generally, the more balanced a position is, the more difficult we find it to evaluate.

Instead, calculation is the tool that is going to serve us to achieve a certain goal that previously had dictated the assessment of the position and defined plans. In my opinion, calculation does not work by itself; always you have to be linked to a prior strategy.

Given the above, we know, at least, a moment in which we calculate: when there is a previous plan and desire to reach a goal. It is what I call **proactive calculation.** That is, the calculation ends up being the logical consequence of a plan, and it unfolds through it.

But sometimes we also have to calculate reactively; i.e., for defensive purposes or to counter when our opponent who, based on his/her plan, tries to get a milestone and begins operations against us. On these occasions, we speak of a **reactive calculation**. Reason, if everything went by the "logical" channels, you would be able to anticipate your opponent's plans and could integrate them into yours. Although not all have the capacity to anticipate Anatoly Karpov...

Then, after taking into account all of the above: **When should I calculate?** We should calculate when:

- There is contact between pieces. Our pieces start direct operations against our

opponent, or our opponent starts operations against us. There are possibilities of "interaction" between the pieces: captures, checks, blocks...

- You do not necessarily have to calculate only before tactical possibilities. This is one of the things that I think is not always well understood. You may have to calculate sequences (and sometimes complicated sequences), although there is no typical theme.
- In pawn races or prior to pawn race positions. In fact, the calculation of pawn races is a great way to get started in the calculation of positions before starting complex positions.

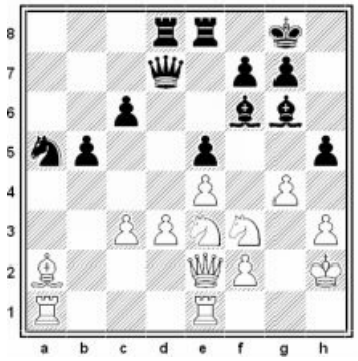
When should you not calculate?

- **At the opening .** This is written with a little care. Actually I should say that if you are calculating at the opening this is usually a bad sign, in addition to one of the most common causes of time trouble. The opening is a phase in which we deploy our forces and captures should just flow, having already studied at home, executed or at least taken into account the general principles of the opening.
- **If you take more than 17 or 18 minutes calculating a position .** This is not math. I don't want to say that when 17 minutes arrives, you just have to do the first thing that pops into your head. Rather, that usually thinking more than 10 minutes does not bring us anything, and overcoming the barrier of 17 or 18 minutes generates more fatigue and provides more mental disorganization than clarity. Maybe I would go up to 20 minutes for super complex positions where there is a very large amount of interaction between many pieces.
- **When there is an effective solution and practical alternative to another complex and difficult to calculate one .** Imagine you have the possibility, at a given position, of starting a complex calculation to get an advantage that supposedly will result in an ultra-sophisticated sequence, or choose a quieter continuation where you'll take less risk and therefore reduce the chances of mistakes, and give yourself an advantage at least somewhat lower than the super-complicated sequence. It is preferable to opt for the second route and not calculate. Often, complicated sequences

generate enough uncertainty that they keep too many expectations on them. If the alternative will not provide an advantage or disadvantage, perhaps it's worth a try. You can see a free lesson on this on my YouTube channel (in Spanish): https://www.youtube.com/watch?v=YlWheUXrAHo

How to calculate?

Once you've decided you need to calculate, it is the time to stop and do it properly. I will explain what is the most practical method that is going to give you better results than calculating. Let's go deploying the method from a game in which I caught a promising position against a strong player of ELO 2225 (you'll see it later). For now, think following your "own way" how would you move in this position with **White**.



First : Consider only those moves that have some sense from a logical point of view (we will not calculate moves randomly without a sense), which pursue a tactical idea (for example: according to a pattern you already know) or those moves that are forced and/or maintain the tension of the position (usually, try to always keep the tension as he/she who dissolves it, tends to remain inactive). I call forced moves "captures", the check and attacking moves, which threaten something directly.

Second: Begin to calculate the forced moves (first the checks, then captures and then attacking moves) piece-by-piece, starting with the highest to the lowest value. As you are practicing, you're going to realize that you need to go back mentally fewer times on the same sequence. Therefore, it is very important that you train this skill. The ultimate goal is to get to the point that each sequence is analyzed once.

At the end of each sequence calculation, you should evaluate the resulting position and compare it with the rest.

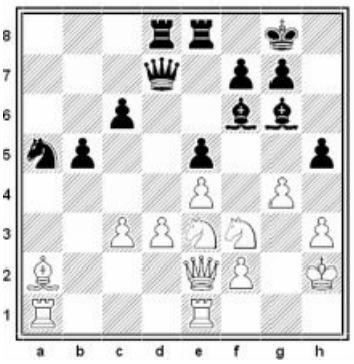
Third : When you value your opponent's response to each of the previous moves, you always place highest value on the strongest response (one in which he/she counterattacks, doesn't

lose material, moves actively and maintains the tension...).

Fourth : If none of the above moves work, value that which takes into account a tactical pattern of the position.

Fifth : Finally, calculate the move that is positionally stronger.

Let's see how to perform the above scheme with the position that I showed you earlier.



We will take into consideration all the moves that are enforced: gxh5, Nxe5 and Bxf7+; those pursuing some tactical idea (in our example there is a discovery found about the black knight that is "hanging" and we avoid the threat hxg4, but maintain the tension (g5). But we will only deepen the move that, after this first analysis, to us seems better. We begin by forced moves. Let's start by check:

- After Bxf7 loses material with the simple line: 25.Bxf7+ Bxf7 26.Rxa5 Qxd3. We are not interested.
- Nxe5 makes no sense. After Bxe5 we lose material and the game.
- gxh5 does not make much sense, since after Bxh5 the White king is unprotected and it also creates an uncomfortable pin on f3. Discarded moves.

Therefore, none of the forced moves is valid, but we must respond to the threat. Consider the last option: g5, the move that was performed in the game.

Sánchez Muñoz, Daniel (2083) - Caracuel Barraza, Eduardo (2225)

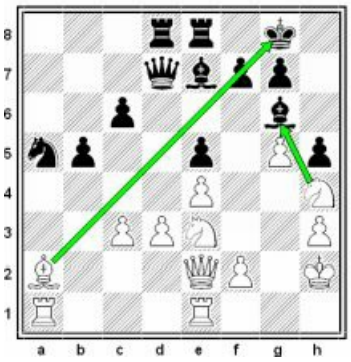
[C77]

Madrid League 01/13/2013

25.g5 Be7 26.Rad1?! [Natural move in time trouble not seeking the central elements of the position and after which I lost all my advantage. The game ended in a draw. However, I should

have previously valued other attacking options, but I opted for a solid unpretentious run. This is one of the frequent errors in positions where there is no contact between the pieces. If I had correctly followed the scheme, I would have rated the only alternatives as Nxe5 (which is bad) and Nh4 the strongest form of play:]

[26.Nh4!+- again, choosing a move that threatens active attacks gains material and the game.



26...Kh7 and now White should have anticipated 25: Bxf7 and Nxg6 as the chosen moves. If any of the two work, White should win. *(26...Qxd3 27.Nxg6 Qxe2 28.Nxe7+ Rxe7 29.Rxe2+-)* And again the most aggressive move of all 27.Bxf7! Bxf7 only move 28.g6+ and now White is proceeding to extract the king 28… Bxg6 29.Nxg6 Kxg6 30.Rg1+ Kf7 31.Qxh5+ Ke6 32.Rxa5 with a devastating position; 26.Nxe5?? watch out for automatic moves. It is not possible to capture the pawn as: 26…Bd6 27.d4 Bxe5+ 28.dxe5 Rxe5 29.Rad1 Qc7 30.Rxd8+ Qxd8 31.Bb1 Qxg5 with Black advantage].

As you've been able to see in this simple example, simply following the scheme, we have less chance of getting lost among the swarm of sequences. The difficulty of the positions to be calculated is very variable; for this reason we have to practice and get used to automating the efficient habit of calculating.

g) Prepare yourself under competition conditions: the interaction between cognition and emotion

Long has it been thought that cognition (cognition is the intellectual faculty to understand: thought, memory, imagination and will) and emotion, were independent systems. However, several recent studies in cognitive and neurobiological sciences have shown that the relationship between cognition and emotion is more interdependent than independent. This conclusion should interest chess players a lot.

There exists a **congruence effect** on the encoding and retrieval of information from our memory with our emotions. Emotions can influence the process of memory when "recording",

"archiving" or encode information as it comes to retrieve it.

One element that takes into account our memory when incorporating information is the emotional charge. The events of your life that surely you remember clearly are more-intensely emotionally charged than others that were deleted or less accurately remembered. In our case, as chess players we will not find frequent information about chess technique that impacts us emotionally (as you would, for example, if today they told us that the tectonic plates are opening up and the Earth is going to split in two), but this principle will have its practical relevance.

Why?

Because the **congruence effect** also tells us something that interests us: the states of consistent mood in the coding and recovery phase improve memory. That is, if we are studying chess in the middle of a party, we will be more likely to remember what we have learned (if we have learned something) in another party, than in a chess tournament. And this is why it is a good idea:

- To train under competition conditions. For example, a table and a chair, with real pieces (no computer) and with a real game clock. Trying to experience what it feels like in a real tournament, even minimally.
- Taking notes on the game when it ends, as explained in the related point "internal review." Thus, emotions are skin deep and will help to codify our first impression of the game much better.

D. Learn more chess. The most effective learning of all

As I have explained, if you want to win more games you will play better and know more chess. I have spent all the previous chapter explaining how to play better, how to enhance and improve the skills that make us achieve this goal (although you will not play better by reading; you play better by practicing). But also, as suggested, we need to incorporate new chess knowledge in all phases of the game, because our study should promote the universality of our game, which means focusing on all areas without leaving anything out.

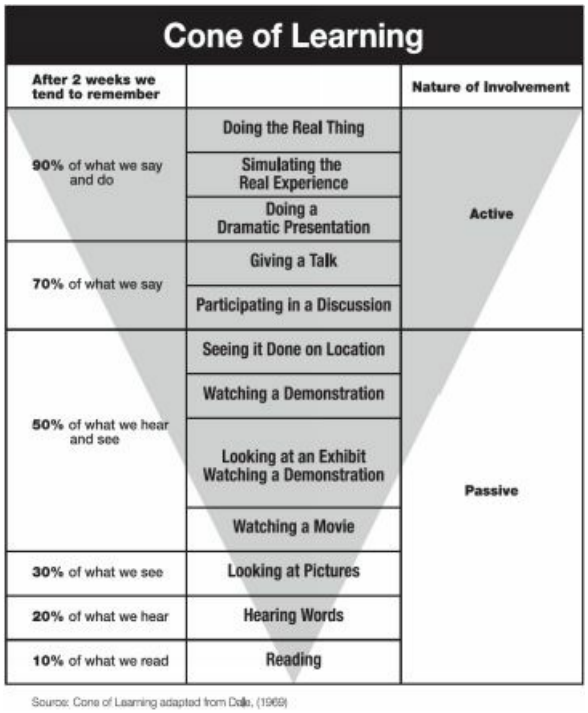
"They told me and I forgot; I saw and understood; I did and I learned "(Confucius, Chinese philosopher, 551 BC-478 BC).

Historical note

Edgar Dale was an American educator (died in 1985), known for

his famous experience cone. The Dale experience cone is a model that incorporates several theories related to learning processes. During the 1960s, Edgar Dale suggested the theory that students retain more information by what they "do" than by "listening", "reading" or "observing." The cone was originally developed in 1946 and was conceived as a way to describe various learning experiences. Essentially, the cone shows the progression of the most concrete experiences (at the bottom of the cone) to the abstract (at the top of the cone).

When Dale investigated methods of teaching and learning, he found that much of what we experienced could be summed up in a pyramid or "graphical representation." He said that the cone was not designed as a perfect or mechanically flawless picture that corresponded with a literal certainty. But that it could serve us as a visual aid to explain the interrelationships of the various types of audiovisual materials, as well as their individual "positions" in the learning process.



The figure above shows what we will be able to do at each level of the cone (learning outcomes that we can achieve) in relation to the type of activity we are doing (reading, listening, viewing images, etc.). The numerical figures on the left side of the image indicate what people usually remember about the experience that relates to knowledge. The percentage, as explained, is not mathematical; it is simply explanatory.

It is important to remember that this does not mean that reading and listening are not valuable learning experiences, but "doing the real thing" can lead to the retention of a greater amount of information. This is partly because those experiences near the bottom of the cone, wider and including real-world experiences, require the use of several of our senses; it is believed that the more senses that are used, the greater our ability to learn and remember an event or experience.

Contributions from Dale endorse informally what we already know from teaching chess. From which we must ask: **What is the most effective way to study chess?** The answer is: a combination of past experiences (passive and pseudo-passive learning), linked to an informative learning.

As explained above in relation to **passive learning:** it is useful for the acquisition of criteria, methods and fixed rules for dealing with known and recurring situations.

This type of study (passive), with additional effort and not simply acting like a mere spectator, will help you incorporate concepts, standards and methods that then have to be secured to endure over time. It is useful to understand openings and endgames, also to acquire strategic concepts and to provide general guidelines to your training plan. For example, all you're doing

by reading this book is passive learning.

Only studying endgame theory, for example, does not secure what you learn. Because, as happens in a game of chess, the answers they give us are not as important as the questions that we ourselves ask. Hence the most effective way to affix concepts and ideas are following three key strategies in your planning:

- Learning through an informative study: teaching to learn.
- Collate materials.
- Fragmenting the study.

Learning through an informative study: teaching to learn.

You may be surprised by this statement: as I write this book I learn more than you as you read it.

Why is that the case?

In a study led by Dr. John Nestojko in 2014, he requested half of a group of participants to study information and then take an exam. The other half were told that they had to study the information to teach others. It is important to note that none of the participants were people professionally engaged in teaching. Subsequently, they all took an exam, a conventional test in that neither group really had to teach anyone. Interestingly, those participants who believed they were going to have to teach others did significantly better.

> "We tested with test students, and students kept especially important information better in their memory when they expected to teach others," said lead author John Nestojko, postdoctoral researcher in psychology in Arts and Sciences WUSTL.

These results, which we already knew informally by the practice of years of studying chess, suggest that simply noting that the information studied is to be explained later is enough to make them devote themselves to learning more-effective approaches than we use when we are not required to explain the material studied. **Study participants who expected to teach produced a more complete and organized memory. This competition is critical, for example, in the preparation of openings.**

> "When teachers are prepared to teach, they tend to look for the key points and organize information into a coherent structure," explained Nestojko. "Our results suggest that students also use strategies such as effective learning when they expect to teach."

So, just instilling the expectation of having to teach someone will potentially increase the effectiveness of learning. For this technique to reach its full potential and be effective, it is necessary that you really study to teach (in fact, you can do the test to teach a friend or even record yourself) and do not settle for auto-explanatory learning. Use this system to

fundamentally study openings and endgames.

Therefore, attending the reproduction of a game as a mere spectator will have effects that I call educational-recreational. We entertain, learn some things, but its effects on the medium or long term leave much to be desired. Hence, the importance of using this type of approach. In Chapter VI, I delve more into the operational side.

Collate materials

A group of researchers at Kent University decided to analyze the most common techniques of study to determine which of them were the most effective. As chess players, we do not usually use highlighters, re-read or memorize keywords, but this study sheds some interesting results beyond those so frequent among ordinary students, for the player who wants to optimize their learning practices.

Something that this study gives us is that interspersing subjects is a strategy that has as much impact on learning as what one learns auto-explanatorily (one of the most common techniques among students). **Collating works best because it fits into our natural ability to recognize patterns and discrepancies**. When you pass from the endgame preparation to opening preparation, you encourage this innate ability as a result of contrasting subjects. It is preferable, therefore, to mix separate subjects on the same day than to devote one day to one subject. Another way to take advantage of this intertwining technique is to mix training (resolution settings) with study.

Study in fragmented sessions

Your ability to retain information decreases after about 25 to 30 minutes, and **when you take one hour studying it has decreased no more and no less than 30%**. The solution is to divide the study sessions in portions. You divide them into fragments of approximately 30 minutes rest, five minutes rewarding yourself with activities you like. Thus, in five minutes of rest, you recover about 90% of your attention and can continue more effectively. Remember, in *The Zugzwang Method*, we want to maximize all components of learning.

1. Progressing in all three phases of the game

a. Openings, by the GM Herminio Herraiz

i. Keys to playing all openings without being an expert

In my experience of over 15 years of coaching at all levels, often I have had to face the following question: What should I do to play openings well? Or what is the correct method of

dealing with this first stage of the game?

Let's be honest. We are not completing a one on one against Kramnik or Carlsen, so while we prepare well at this stage, our game should be natural, simple and following the basics of the game. Of course, many approaches are possible in study and openings, and there are too many basic errors that we often make and must avoid.

Both "fear of opening" (I will be hunted by my opponent if I don't study) as "the overvaluation of the study of lines" (if I study "such and such" a book I'll win many games in the opening) are common feelings among chess players.

I always work with my students (especially those who are chess fans) **to avoid the following errors:**

- Thinking that memorizing long lines of openings is essential at this stage, and gives us an advantage over our opponents.
- Thinking that it is indispensable "to be the last one in the library" at this phase; that is, thinking that knowing "ALL" the recent games will keep you from losing.
- Believing that the study of openings is very complex and will require a disproportionate amount of time.

It is evident that we should know some important lines and meet and review games on our favorite lines. But there are more important and logical factors that we can use to effectively play the openings.

We will follow a simple **set of tips that can guide us** at this early stage.

UNLEARN

You will say to me: "So many years learning and learning for someone to tell me I must unlearn!" Why? The key resides in the following detail. We begin to make a significant leap in the world of openings when we understand that he/she who is "fashionable" with the most recent games will not necessarily have the advantage. The most important thing is to assimilate and understand the main ideas of our favorite lines and, above all, using and exploiting naturally the most basic concepts.

So forget about complex methods of study and unlearn a bit.

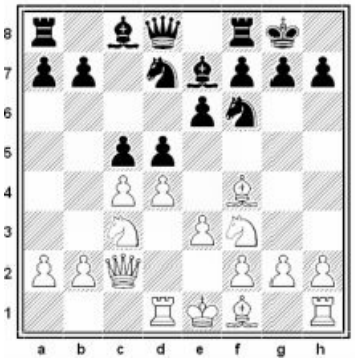
We simply need to take advantage of such simple concepts as **development, control the center and protect our king**. Here is an example at the highest level where all these details made the difference decisively.

Mamedyarov, Shakhriyar (2756) - Savchenko, Boris (2581) [D37]

Aeroflot Open, 2015

1.d4 Nf6 2.c4 e6 3.Nc3 d5 4.Nf3 Be7 5.Bf4 0-0 6.e3 Nbd7 7.Qc2 c5 8.Rd1 [So far the game is following well-known paths, and in this last move White also makes a natural move,

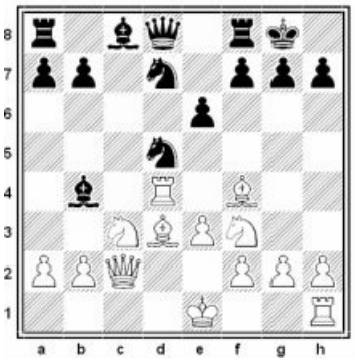
centralizing the rook to try to exploit changes in file “d”. Despite not being the most used moves, it follows the most basic concepts of development and centralization].



8…cxd4 9.Rxd4 [This move may seem risky, but it does have a certain logic. The “d” file is important for White pressure and Mamedyarov understands that the rook is not in danger, as the e5 advance is conveniently controlled].

9…Bb4?! [The beginning of the plan... a little unnatural, moving the same piece twice to try to exploit a pinning that White may soon solve] [9…Qa5 is the right move. The queen pins the knight, but, above all, is released from the possible tactical issues on file “d”. In addition, it can prepare the e5 advance (center move) and is allowed to continue with moves like Nb6 (development). Simplicity concepts!].

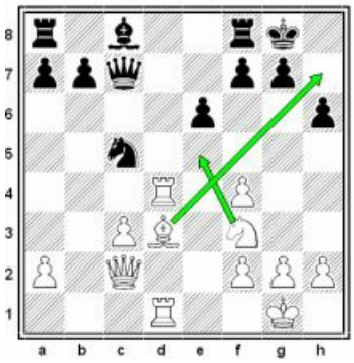
10.cxd5 Nxd5 11.Bd3! [Mamedyarov makes an interpretation of the excellent opening. Although its structure can remain damaged and he may lose the bishop pair, he understands that accelerating development, pressing the kingside and controlling the center with file “d”, will leave Black confined. With natural moves, White improves its position].



11...h6 [11...f5 was maybe the most sensible option to close the great light diagonal. Although in that case the e6 pawn is a clear point of attack 12.0-0 Nxf4 13.exf4 Qe7 14.Re1 with

significant pressure on the weakness] **12.0-0 Bxc3 13.bxc3 Nxf4 14.exf4 Qc7** [perhaps Black relied on the strength of its position and on completing development smoothly with b6-b7, and even eliminating the strong bishop on d3. They could impose their better structure in the endgame. But thanks to good development, the initiative of White (with a dynamic game) is imposing a static game on Black (best structure)].

15.Rd1!? Nc5? [A major mistake that ignores the specific details of the position and leaves Black in a losing position. He intends to remove the d3 bishop, but coordination of white pieces is imposed directly].



[15...e5! This was the most sensible and correct move. While it is true that the White structure is arranged in return, it is able to activate the pieces and, finally, to finish development. White's advantage would not be decisive even if the Black development accelerates. 16.Nxe5 *(16.Rc4!? Qa5 17.Re1)* 16…Nxe5 17.fxe5 Qxe5 18. f4 Qf6 *(18…Qc5 19.f5 Bd7 20.f6 g5; 18… Qe3+ 19.* Qf2 with slight advantage in the endgame due to having the best centralization of pieces*)* 19.f5 White pressure continues, but Black can still fight].

16.Bh7+ Kh8 17.Ne5! [A key combination. The black pieces on the queenside cannot develop and their king is enclosed and there is the threat of Nf7. The black pieces, separated from their king, cannot avoid the tactical ideas of White, for example Rd8 followed by an incursion through Nf7] **17...g5** [A logical move seeking space for the king. However, the weakness of the kingside is punished with the fast pace of pieces and control of the file “d”].

[17...b6 seems a natural developing move, but also would lose after 18.Rd8! Rxd8? (18...Bb7 19.R8d7 an elegant blow that can finish exploiting the weakness of f7 19...Nxd7 20.Rxd7 Qc8 21.Rxf7 is strongest. The knight is decisive for the attack and we do not want it to be eliminated *(21.Nxf7+ Rxf7 22. Rxf7 Qc6* could still complicate victory*)*) 19.Rxd8+ Qxd8 20.Nxf7# the rapid development of pieces has prevailed! 17...g6, followed by 18.Bxg6 fxg6 19.Nxg6+ Kg7 20.Nxf8 Kxf8 21.Qg6 with a decisive attack 21...Bd7 22.Qxh6+ Kg8 23.Rxd7 Nxd7 24.Qxe6+ Kh8 25.Rxd7].

18.Bg6! gxf4 [18…fxg6 would be answered with 19.Nxg6+ Kg8 20.Nxf8 Kxf8 21.Qg6 important entrance of the queen which gives greater strength to the move Rd8 21...Bd7 22.Qxh6+ Kg8 23.Rxd7 with all well-placed pieces the end arrives 23…Nxd7 24.Qxe6+ Kh8 25.Rxd7 with a decisive attack; 18...f5 to close the diagonal, but Black's castled position is getting weaker and pieces continue to move to the attack. 19.Qe2 with the idea of Qh5 or fxg5. What do the pieces do without the development of Black? 19...g4 20.h3 the opening of lines again allows the entrance of the queen to attack].

19.Qe2 [Black is lost to the strong entrance of the queen on h5 or blows to f7].

[19.Rd8 was again an elegant finish; 19.Qe2 for example 19...Qe7 *(19...Kg7 20.Bxf7* demolition of the castling! *20...Rxf7 21.Qg4+ Kf8 22.Rd8+ Ke7 23.Qh4+ Rf6 24.Ng6+* all pieces take part in the attack while the black pieces are mere spectators *24...Kf7 25.Rf8+)* 20.Nxf7+ Rxf7 21.Bxf7 Qxf7 22.Qe5+]. **1-0**

USE YOUR INTUITION

It is also quite often forgotten that one of our best weapons to confront the opening is intuition. Generally, we engage in "ostentatious" reflections about what was played in this or that line or try to remember what move we read in that book or what we saw that day on the computer. Our experience can bring us great additional information and it will be critical to intuit such important details when it comes to what direction our plan should go, or "tracking" an unnatural move of our opponent and understanding where might be the real danger of the position.

Comparison of the board position with earlier positions that we have faced mark for us the correct direction of our move and we will succeed in finding the differences to examine.

Mistakes we made previously will be very useful and will guide us in not only making them again, but also to punish an opponent who commits them.

Let's punish the wrong incorrect move of our opponent!

Inarkiev, Ernesto (2693) - Sutovsky, Emil (2660) [D90]

A. Karpov Tournament, 2013

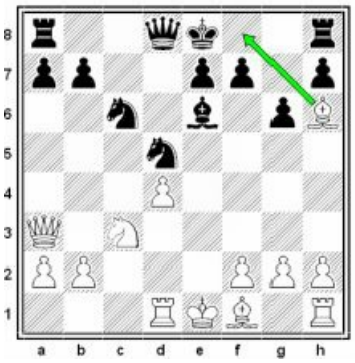
1.Nf3 Nf6 2.c4 g6 3.Nc3 d5 4.cxd5 Nxd5 5. Qb3 [It is well known that we must be careful with the rapid development of the queen at the opening, as we may be putting her in danger, exposing her to attack by opponent pieces. However, there are exceptions and, in certain lines of this opening, the white queen is useful to help fight for the center and control important squares such as c5 and d5] **5…Nb6 6.d4 Bg7 7.Bf4** [follow the development and central control, as much with pieces as with pawns. The d4 pawn looks like it can be captured, but pinning with the strong move Rd1 eliminates that possibility].

7…Be6 [7…Bxd4? is a loss after 8.Rd1 Nc6 *(8.Bxc3+* saves the pin, but now the h8 rook is also attacked *9.Qxc3 N8d7 10.Qxh8+* 9Nb5] **8.Qa3 c5 9. e3** [the simplest, ending the development] [9.dxc5 Nc4 could jeopardize the situation of the queen and also put pressure on b2 10.Qb4 0-0 and attacks on the white queen will follow through Nc6 or a5].

9…cxd4 10.Nxd4 [After the centralization of parts, Black is forced to sacrifice one of its valuable bishops] **10...Bxd4 11.Rd1** [Over centralization!] **11...Nc6 12. exd4** [We arrive at an important moment of the game. Black, having controlled the d5 advance, must castle and protect its king, even though it finds itself at the center of the board] [12.Nb5 would be a logical idea if White wants to capture on d4 with the knight, so as not to spoil their structure. However, you cannot criticize the choice of the game, where Inarkiev wants to accelerate his maximum development 12...0-0 13.Nxd4].

12...Nd5 [The first decision in the wrong direction] [12...0-0! 13.d5 would not be enough, and after 13...Bxd5 followed by e6, the pin is resolved].

13.Bh6! [The safety of kings cannot be ignored even in the opening. And White does not miss an opportunity to prevent the opponent short castling].



13...Qb6 14.Be2 0-0-0. 15.0-0 [The White move could not be more correct. After good development and the centralization of pieces, it secures the position of the king and invites the capture of the d4 pawn by Black. This decision can be very risky, and leave Black exposed: its king as much as to different tactical threats]. **15...Nxd4** [Black has been activated with the (apparently) strong knights in the center and also has won a pawn. But White's position has several strong points:

1) You can take advantage of the weakness of the black king (in the exposed file and with the open black diagonal h2-b8).

2) The black knights may be in trouble by not having a strong outpost in the center.

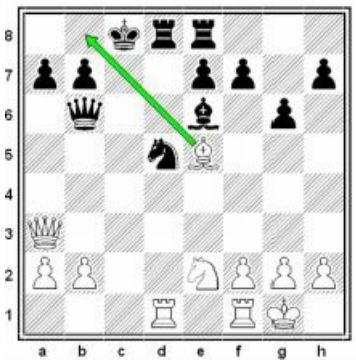
3) The dark squares cannot be well defended without the bishop of that color. It is the time to work on our intuition. We began to "suspect" that the position is prepped for a specific

purpose, and we must look for those energetic ways that demonstrate our advantage. There are several strong moves in order to continue].

16.Bg7! [The most accurate. This strong move creates a double threat on h8 and d4, and forces the intermediate capture on e2].

[16.Rxd4! Another powerful blow that eliminates defenders and distances the queen from the defense 16...Qxd4 17.Nxd5 another major blow that frees up the e3 and f4 squares for the bishop. The dark squares have no defense and we must harness the power of this piece 17 … Bxd5 *(17…Rxd5 18.Be3 Qe5 19.Qxa7; 17...Qxd5 18.Bf4* and Black remains lost before the combined threat Rc1+ and Qa4 *18…Rd6 19.Bxd6 exd6 20.Qc3+* winning the second rook*)* 18.Be3 White's attack is very strong. For example, 18...Qe5 19.Qc5+ Kb8 *(19…Qc7 20.*Qxa7 follows the attack with Rc1, Bb6 or Qa8+, and the black king has good refuge. The White pressure is important*)* 20.Qxa7+].

16...Nxe2+ 17.Nxe2 Rhe8 18.Be5! [Like the open files, diagonals open up to allow the moving of pieces to their best squares. The bishop centralizes and after the changes, White has achieved a very important factor. The black king is in danger and the presence of different colored bishops favor the attacking side. In this case, the black king has been deprived of the b8 square on which to hide, so the attack with Rc1 can be decisive. The "unnatural" Black game will be punished].



18...Nb4 [Black trusted this maneuver that prepares the defense with blocking the open file after Nc6. However, the Black situation is already very delicate and the blows continue from dark squares] **19.Bd4!** [More transfers, in this case to divert the defensive piece (the black queen is the key to the defense because it defends the knight and the point a7)] [19.Rc1+? Nc6]**19… Qb5** [19… Qd6 20.Qxa7 Nc6 21.Rc1 also leads to a devastating attack] **20.Nc3** [the queen has no squares on which to defend the knight].

20… Qc4 21.b3 Nc2 22.Qc1 [Powerful move. The knight is attacked, but also a future threat through the open file “c” is created] **22…Qxd4** [last attempt] [22… Qc6 23.Qxc2].

23.Rxd4 Nxd4 24.Nb5+ [The discovered attack is now the key] 24...Nc6 [24...Kb8 25.Qf4+].

25.Qf4 [Again the dark squares, and again Black is defenseless and unable to place his king in a safe place] **25…Rd7 26.** Rc1 [the Nxa7 entry is devastating] **26…Kd8 27.Nxa7 Rd6** [27… Nxa7 28.Qb8+Nc8 29.Qxc8#] **28.Nb5** [Black decided not to suffer any more] [28.Nb5 Rd7 29.h4 opening a gap for the king before proceeding with the finish Rxc6–Qb8+]. **1-0**

KNOW LOGIC

You see, we move in the opening game naturally. Another key point in the game is to take advantage of any logical position. In these technological times we live in, we let ourselves get dragged along by the valuations of computers or comments from chess players who are better than us. Obviously, as much as the former can be of great help whenever we properly understand how to use them and what they really say about us...

We must understand that the potential advantage (or disadvantage) in a position is not as simple as a single number or rating that a computer displays. It may depend on important specifics based on a single element of the position.

An advantage in a certain position can be decisive for us, but perhaps only for one key detail or perhaps only on a specific part of the board. **The advantage is usually not generally global, but very localized,** and often it is quite variable and / or temporary.

So you must be alert and clear:

- Where on the board do I have an advantage (strong side)?
- What pieces make that difference?
- About what tactical details as much as positional should I be on the look out for?
- What changes or transformations can influence the potential advantage of one side or the other?

In short, you must use logic to "dissect" the position and clearly understand what we use to develop our post game. Since we are "rational animals" we try to take advantage of this last detail.

Let's try to understand the position and apply logic!

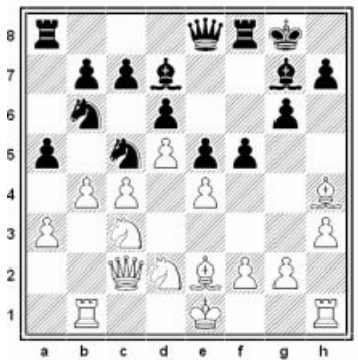
Bjelobrk, Igor (2341) - Grischuk, Alexander (2785) [E92]

World Cup (Tromsø, 2013)

1.Nf3 Nf6 2.c4 g6 3.Nc3 Bg7 4.e4 d6 5.d4 0-0. 6.h3 e5 7.d5 a5 8.Be2 Na6 9.Bg5 Qe8 10.Nd2 Nd7 11.a3 f6 12.Bh4 Nb6 13.b3 Bd7 14.Rb1 Nc5 15.Qc2 f5 [The game has been developed in a natural sense. The closed nature of the position has invited both players to make slow maneuvers and lateral ruptures. Black prepares its central pressure with the f5 rupture and

the c5 knight. Meanwhile, White seeks to consolidate its space advantage and support progress on the queenside with b4].

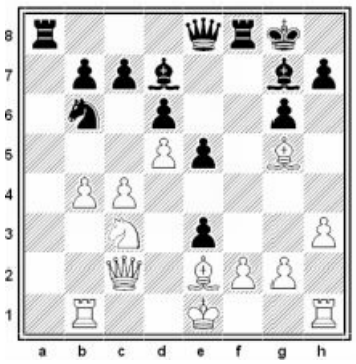
16.b4 [An important error, which will be the beginning of the collapse of the White position. It is true that the White plan is logical: after the rupture, space is gained and the c5 knight is expunged. However, there were more important factors to consider such as completing development and securing the position of the white king before starting more active operations] [16.0-0 was more natural, and better].



16...axb4 17.axb4 Nxe4 18.Ndxe4 fxe4 19.Bg5? [The decisive error, and right in the opening! White still continues without castling and moves the same piece twice to try to reach e3. We are facing a key position in the game. White has developed its queenside actively and can advance its pawns vigorously with force. But it has forgotten that before it should have castled and consolidated its center with the development of pieces (natural game).

With a strong center, the subsequent expansion on the side could have more chances of success. The White idea is clear. After Nxe4 and 0–0 the control of the center is absolute, and thus it can focus on mobilizing the queenside. But it's Black's turn, so that with energy it can fight against the opponent's plan. Wait for it! It is time to use logic and show **where our advantage lies**. The position is favorable for Black, but not in any form. We must find **the factors** that are favorable for us. And bang!]

19...e3! [Powerful play! The black pawn was going to be captured, so Grischuk found the best possible way to sacrifice it. With this pawn sacrifice, Black will activate all its pieces and will seek to play in a coordinated way among them. The diagonal (f5-b1) is opened up for the white bishop, and it can search for a new blow with e4 also to activate the other bishop. With the entry of these two bishops, files "a" and "f" are open for the rooks and the e8-a4 diagonal for the queen, **all** the white pieces become active. In addition, the opening lines attempt to demonstrate the delicate position of the white king still in the center. As you see, we apply simple concepts and try and punish the careless game of our opponent].



20.Bxe3 [The natural move, even though a strong finish is encountered]

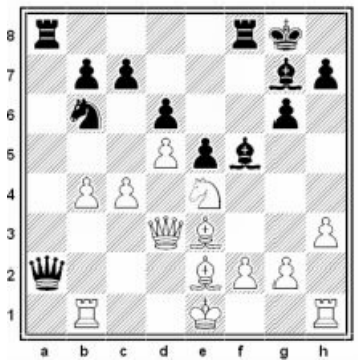
[20.fxe3 avoiding the sequence of the game, but also with serious drawbacks. The g5 bishop remains without a play, the "f" file severely weakened, and also Black obtains good squares after the 20...e4! advance. The bishop is now powerful and pieces enter the attack (Ra3, Qe5, or Na4). More open lines! The Qe5 threat would create a double attack on g5-c3 that would gain material. White's position is already lost. 21.Nxe4 gives us a beautiful finale after *(21.Qxe4 Bxc3+; 21.Bf4 g5 22.Bg3 Ra3 23.Nd1 Ba4* all pieces involved in the attack *24.Qc1 Ra2)* 21...Ba4! 22.Qd3 Qxe4! Spectacular sacrifice, taking advantage of the loss to open the lines 23.Qxe4 Bc3# a fitting end for that king who did not want to castle on time; 20.f3 would try to keep a closed position, but also at a high price. Black at the moment keeps its pawn advantage and White has further weakened its dark squares. Black's advantage can be demonstrated in several ways. For example, 20...Bf5 21.Ne4 Qa4 with strong invasion by the file, and after 22.Qxa4 Nxa4 the threats follow one after the other. For example, Bxe4-Nc3 winning material].

20...Bf5 21.Ne4 [The knight is at the point of obtaining the block, but blows follow].

[21.Bd3 also lost material 21...Nxc4 taking advantage of the pinned bishop].

21...Qa4! [Another piece that is activated and also taking advantage of an important concept. It tries to eliminate the most important defensive piece, defending the powerful central knight] **22.Qd3** [22.Qxa4 Nxa4 23.f3 Bxe4 24.fxe4 Nc3 the central e4 point falls and thus the black pieces enter to attack again 25.*Rc1 Nxe4 (25...Nxe2!? 26.Kxe2 Ra2+)* 26.Bf3 Ng3 27.Rg1 e4 another further advance to give life to the pieces. The rooks enter, but also the bishop on g7].

21...Qa2! [With the strong counterattack, all white pieces are exposed and it cannot consolidate the position. It attacks e2, b1 and gives passage to the rook against a3. White's position has collapsed for not following the most basic opening concepts (develop, control the center and protect the king)].



23.Bxb6 [23.0-0 Bxe4 24.Qxe4 Qxe2; 23.Rc1 Ra3]. **23...Ra3! 24.Be3** [24.Qd1 Bxe4]. **4… Rxd3 25.Bxd3 Bxe4 26.Bxe4 Bh6!** [And the grand finale] **27.0-0** [27.Bxh6 Rxf2 28.Bd3 e4 and White must resign before the threat of checkmate on e2] **27...Bxe3 28.fxe3 Rxf1+** [and White resigns, before losing even more material] [28...Rxf1+ 29.Kxf1 *(29.Rxf1 Qxc4)* 29...Qxc4+]. **0–1**

I DID NOTHING WRONG. MY POSITION SHOULD BE GOOD!

A theme that to me is recurring in the training of beginners or mid-level players begins with the following situation. During the training session, I begin to review the game of a student and suddenly the following reflection emerges on his/her part:

"*Here I already knew I was in danger (or at least in an inferior position) on move nine because, then this idea threatened me and I didn't know how to stop it. My position is bad because (I played 10-12), so I think I made a mistake on move seven.*"

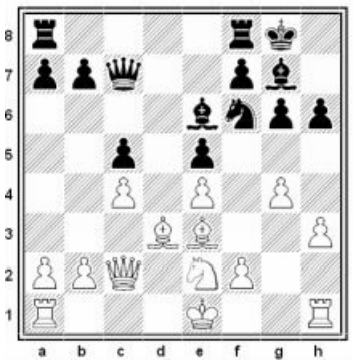
After this "somewhat radical" statement, we proceed to reflect a little on the positional situation and I answer: "*All your moves have been natural, logical, no serious mistakes and follow the important basics, why would you think your position "bad" as you call it?*"

You must be aware that if we stay calm, and apply logic (again) we realize that if our game has been "natural", "logical", "right" then our position should not be bad (it must be also correct). Even though we perhaps have not made the best moves possible in the opening for our position, without serious errors is very difficult to lose (or even become clearly inferior).

So remember to apply to yourself the following statement: **"If I did not do anything wrong, my position cannot be bad."** Thus, we will maintain objectivity in assessing the position and our own feelings about it.

Here's an example to demonstrate the importance of this logical reasoning.

Game analysis. Analyze the following position. Black to move.



[We are still in the opening and before us a very interesting position. Black has naturally developed its pieces; its king is safe and has struggled for the center, both with pieces and pawns. Therefore, it seems that they have a proper game. The white d3 bishop seems to be very bad because it is hindered by its own pawns and also it can feel vulnerable because it finds itself in a semi-open file without the protection of pawns on the “c” and “d” files. Even Black may try to take advantage of the game by dark squares (which have been weakened by placing all the opponent's pawns on light squares).

However, in the game we always have an opponent and we must be alert to their intentions and threats. After stopping them, and after further reflection, we find that threat. Nc3-Nd5 maneuver is a major strategic threat. This maneuver would close the "d" file for the black rooks and also obtain a favorable change in d5 when creating a passed pawn and supporting the center. Black’s moves would be very limited. These threats, which are not tactical but strategic, often are overlooked by not looking so serious. Pessimism can start to invade us and start us thinking: Is Black's position bad? Are we in dire straits? We calmly reflect back and see that the Black move has been natural and without serious errors, so the position should not be bad. If you did it right, why should it be wrong?

Again we could use all the above advice and take advantage of intuition and logic to understand how we can face the opponent's plan, and what factors might be involved for us to show that Black's position is not only correct, but also favorable].

16...b5! [The right play, fighting tactically against the White plan. c4 pressure momentarily prevents the knight from jumping to c3. We must justify that the move works tactically. In that case, we will have our key move].

[16…Rfd8 17.Nc3; 16...Rad8 was the play, but it does not meet the objective 17.Nc3 a6 lost time because the threat was not Nb5 18.Nd5 and White thus obtained a very strong advantage 18...Bxd5 is obligated, but after *(18…Nxd5 19.cxd5 Bd7 20.Qxc5)* 19.cxd5 the situation is really unfavorable for Black. 1) Passed pawn and White support. 2) Limited black pieces. 3) Freedom for white bishops. 4) Pressure on the queenside, especially c5. 19…Rc8 (19…Nd7 20.a4

(20.Rc1; 20.b4)) 20.Rc1; (*20.Qd2)*].

17.cxb5 [The plan to refute, and we get a precise estimate after 17...c4!]

[17.b3 how to defend c4 and renew the Nc3 threat. How does Black arrive in time to stop it again? 17...b4! very strong. We avoid the White maneuver again Nc3-Nd5 and also space is won, creating a new strategic plan with a5-a4. It thus seeks a favorable rupture on the queenside for the entrance of the pieces. In addition, now we can focus on file “d” and especially on pressure points at d4 and d3. Black's position is still preferable and the entire board under control; 17.Nc3? the initial plan strikes before 17...bxc4 18.Be2 the moment we won a pawn, and that which is the best point d5 is no longer strong for the black knight. It's time to take advantage of all the elements that to us initially seemed advantageous (file "d", dark squares, and better development) *(18.Nb5 Qa5+)* 18...Rfd8 19.0-0 Rd4! although it is not obligatory, yes it is a strong move. The file allows it to take advanced points and take advantage of weakened dark squares. Now if the rook is captured, the mass of black pawns will prevail in the center. The Black advantage is obvious. 20.Bxd4?? an error that would lose after 20...cxd4 21.Nd1 Rc8 preparing the d3 progress *(21...d3* beware! The opponent moves *22.Bxd3* taking advantage of the c4 pawn being pinned*)*].

17...c4! 18.Qc3 [Taking advantage of the pin by "c" file, the check is defended on a5 and aims to remove the bishop at c2. However, we quickly realize that White's position is dangerous. There is an initial threat cxd3 (which currently fails) and if to this we add a new one we would have a devastating double attack].

[18.b3? fails directly by...18...Qa5+ 19.Bd2 cxd3 gaining a piece for the attack on c2; 18.Rc1?? Qa5+ 19.Bd2 cxd3 again winning a piece by the attack on the white queen].

18...Qb7! [the Nxd3 threat is renewed, but also now entry on e4 or b5 is critical, for example] **19.Bc2** [19.Bxc4 Nxe4 *(19… Qxe4)* 20.Qc2 Nd6 another double attack. The bishop on c4 and the Qxh1 threat allow gain of material].

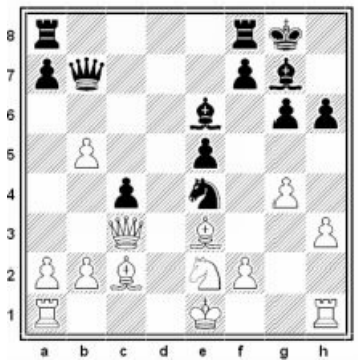
19...Nxe4 [And it is Black that is left with the overwhelming advantage to recover the material.

1) Most active pieces.

2) Rh1 in danger.

3) The activated Bg7.

4) More space and possibilities of direct attack. Black's position was natural and correct and therefore it is intuited that Black should have the best options].



First we intuit and then perform!

WARNING, THE OPPONENT MOVES TOO

As we well know, the initial phase of the game is already beginning to shape the subsequent play, and our opponent begins to show the intentions of his/her subsequent plans. It stands to reason then that early threats arise also, both your own and from your opponent.

These threats can be aggressive and direct, with serious damage to our position. But there may also be other "quiet and less evident" threats, that may also cause us difficulties if we do not react to them in time (as seen in the example above).

So you must adapt as soon as possible because we do not play alone and that "The opponent's ideas must be incorporated into our plans." At the opening, already, we must be alert to this important aspect.

The following is a clear example of this:

Sánchez Muñoz, Daniel (2100) - Agusti Pérez, Luis (1949) [B01]

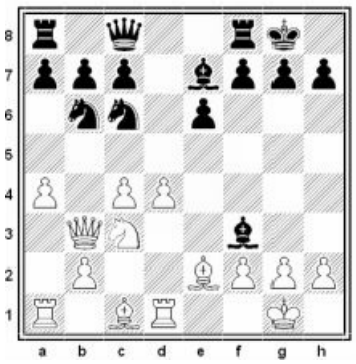
Madrid League (Spain), 2014

1.e4 d5 2.exd5 Nf6 3. Bb5+ [With this move White renounces the importance of retaining its pawn advantage and, instead, accelerates the development for castling quickly]. **3...Bd7 4.Be2 Nxd5 5.Nf3 Bg4 6.d4 e6 7.0-0 Be7 8.c4 Nb6 9.Qb3** [9.Nc3 was more natural and better] **9...Qc8** [not the most precise and, of course, the central counterattack Nc6 was more precise, quickly attacking the White center].

10.Nc3 0-0. 11.a4 Nc6 12.Rd1 [The opening is ending and, despite some slight imprecision, the game has been quite natural and logical. Both sides have developed the pieces and have placed the king in a safe place. The main White advantage lies in the important space advantage. His pawn center can be powerful, and if it advances, it continues to force the black pieces back, leaving Black in a difficult position. The White threat has been located and the advancement of its pawns (a5, d5 and even c5) must be stopped in time. Black, then, should react and

counterattack this center to weaken and exploit weaknesses arising. At the end of the day, the opening of the second player has not been a disaster, so that its position should still have enough play].

12...Bxf3! [The best recourse, continuing to debilitate one of the central pawns. Now it is White that must decide whether it should weaken its castling (with gxf3) or sacrifice the c4 pawn (after Bxf3)].



[12...Bf6? could be an example of a move that attacks the center, but it does not take into consideration the gravity of the strength of White's position. Black has moved many pieces to the queenside so White can take advantage of attacking the other side of the board (the strong side). 13.Ne4! begins the attack 13...Bxd4 *(13...Nxd4 14.Nxf6+ gxf6 15.Nxd4)* 14.Nxd4 Nxd4 15.Rxd4 Bxe2 despite the won pawn, poor position of the black pieces is evident now with a direct attack. The Black kingside is helpless, and moving the white pieces is very easy, depriving the first player of much space. 16.Nf6+! gxf6 *(16...Kh8 17.Qh3 gxf6 18.Rh4)* 17.Qg3+ Kh8 18.Qh4 preparing for the finish with Qxf6–Bh6–Qg7++ 18…Rg8 19.Qxf6+ Rg7 20.Bh6 Qg8 some black pieces slowly come to the defense while others cannot help directly (like the knight, Ra8) 21.Ra3 more pieces to the attack, taking advantage of the open lines! 21...Bh5 22.Rad3 Bg6 23.Bxg7+ Bxg7 24.Rd8+ Rxd8 25.Rxd8#].

13.Bxf3!? [An interesting decision. White sacrifices a pawn but, in return, continues to activate its bishops and aims to take advantage of the tactically bad back position of the black knights].

[13.gxf3 has the idea of defending c4 and sticking with the plan to advance on the center, but now Black is in a position to attack the weak d4 point and also White's castling 13...e5! a good center punch that also allows the black queen to move quickly to the kingside 14.dxe5!

a) 14.d5 would fail before 14…Nd4! 15.Qa2 Qh3 with clear advantage 16.Be3 Bd6;

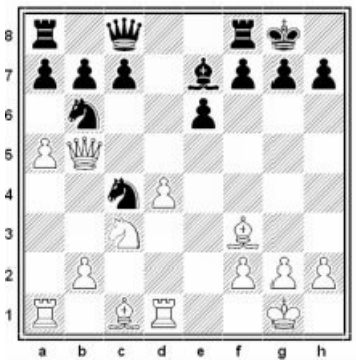
b) 14.Be3 exd4 15.Bxd4 Bd6 and White's castling is weak on h2 and for all the dark squares. The knights now obtain important central squares, and the queen moves to h3 to attack

(15…Nxd4 16.16.Rxd4 Bc5); 14…Nxe5 15.Ne4 *(15.* a5 Nbd7 moving the knight to f6 or c5 to add more pieces to counter*; 15.f4 Ng6)* 15…Qh3 16.Bg3 Nh4 18.Bg3 Nh4 18.Bxh4 Qxh4 with a move by both sides. 19.a5 Nc8 20.Qxb7 Nd6 Black has sacrificed material, but has a strong counterattack on the dark squares].

13...Na5 14.Qb5!? [And here comes the key moment of the game. How should Black continue? There are two possible captures on c4, and each has a drawback. We must accurately locate the opponent's threats so we can properly assess each of our choices. Capturing with the "a" knight allows the advance a5 and capturing with the "b" knight leaves the two knights exposed (after b3). What it is the correct choice? It is important to find out the specifics of the position, and the calculation is shown definitively]. [14.Qc2!?].

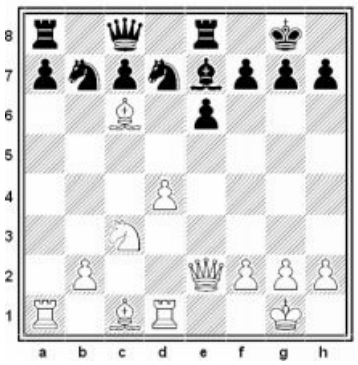
14...Naxc4? [The final mistake, now the "a" pawn advances and the knights grow tighter each time]. [14...Nbxc4! was correct. The knights seem hunted, but the intermediate moves a6 or c6 force the queen out and thereby save the position 15. *Be2 (15.b3? c6 16.Qh5 Nxb3)* 15…a6 just in time the knights are saved *(15...c6)* 16.Qh5 f5 17.Rb1 Nd6= Black has saved the position and White, despite its counterplay (bishop pair and central pressure), must still prove itself as it counters that sacrificed pawn. The position can be considered balanced].

15.a5! [Starts a forced and very favorable sequence, finding the opponent's weaknesses].



15…Nd6 16.Qe2! [Control of the central file "e" is important]. **16...Nd7 17.a6!** [Another heavy blow on the Black position]. **17…Re8** [17…c6 allows a smart blow on the Black position 18.d5! the pinning of the e6 pawn is key to White's attack. Passivity and lack of coordination of the black pieces define the position...18…exd5 19.Nxd5 Bd8 *(19…exd5 20.Qxe7 Nf5 21.Qg5*± recovering the pawn on d5 and pressing hard on b7 and f5.*)* 20.Nb4 the double attack on d6 and b7 wins material. 20...Be7 21.Rxd6 Bxd6 22.axb7].

18.axb7 Nxb7 19.Bc6!± [White control is absolute. It has pinned and threatened the two knights, and moves such as Qb5 or Qb3 leave Black tied up. Neither Ra8 can unpin it (as a7 falls) nor Re8 (as the d5 blow follows)].



19…Rd8 20.Qf3 [With decisive precision Daniel imposed pressure from the back]. **1-0**

II. How to study openings without going crazy

You will probably tell me: "Ok, Herminio, these concepts are important, and I try to apply them in my games. But I also want to be able to be better prepared in the openings to face games with more confidence and security. How should I prepare for this phase from home?"

The "keys" of your opening or defense

As I have already mentioned in the previous point, it is more important that you memorize specific moves up to move 30, or get to know the latest developments of modern theory, following a series of steps to "understand" appropriately the opening we want to play. So I think it's important that we continue a concise general scheme for better learning:

1) It is important to seek **"model" games**, not necessarily recent, in which the most important ideas that are used in this opening or sequences are clearly seen.

2) Knowing the **typically studied** opening maneuvers. We can make a list of them with clear examples, to assimilate them and learn the basics. We also study the pieces that are important in those openings and when, how and what must change and what is important to maintain.

3) Knowing **basic tactical blows**. We look for thematic examples, recurrences, and can even create a foundation with exercises of this type.

4) **Structures that are repeated** in this opening and how to play each one.

5) **Thematic endgames:** the opening is not an isolated phase of the game, and we must know its relationship with the middle game, but also with the endgame that usually arises from this opening or defense.

6) **Key players** playing this opening. It is always important to have a reference with any ambition. And of course we study the most representative players of our openings or

defenses. Let us learn from the best!

7) Finally, we can focus on specific moves and learn **more-advanced sequences** and the most current theory. This point will be easier to make once you understand the ideas behind each move.

So, before reaching point 7, it is necessary "to know and assimilate" many ideas beforehand. We must build good study to really be productive and lasting.

Long sequences can be forgotten with the passage of time or if not continuously reviewing our openings. However, a sound knowledge and understanding of the main ideas will allow us to move safely in the game, and even be able to find the best moves (and even the strongest theory) on our own.

In order to develop some of the points made above, we will look at some examples that can clarify the matter:

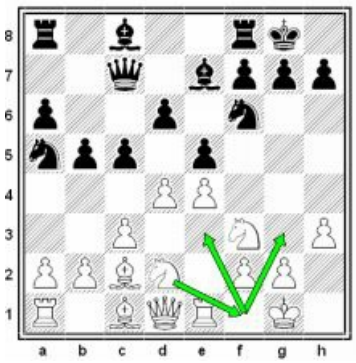
Fischer, Robert James - Shocron, Ruben [C97]

Mar del Plata, 1959

1.e4 e5 2.Nf3 Nc6 3.Bb5 a6 4.Ba4 Nf6 5.0–0 Be7 6.Re1 b5 7. Bb3 0–0 [The initial opening moves have been defined. Now they follow a series of important ideas and maneuvers that make the play in this opening. With one game we will be able to understand many of these ideas and maneuvers]. **8.c3** [First important detail. Preparing the d4 advance, fighting for the center, but at the same time generating a square of escape for the bishop by the c2 square. This piece is key in the Spanish opening, and White does not want to lose against a possible attack from the black knight on a5].

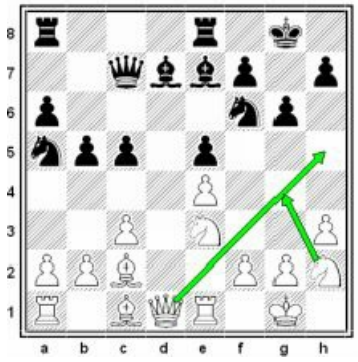
8...d6 9.h3 [Another important move to be understood. If White wants to move with d4, it must first make the center strong. And to accomplish this, it should avoid the Bg4 pin, which would challenge the key point d4] [9.d4 although it is possible, it leaves open the option of a black attack 9…Bg4] **9…Na5 10.Bc2** [the bishop proceeds to save itself, defends the central point e4 and will look to return to its best diagonal Bb3 below] **10...c5 11.d4 Qc7** [We have reached a thematic position of the Spanish opening. White has a slight central advantage. Fischer is now focused on moving his pieces to kingside attack, since the advantage of space will allow promising options on that side].

12.Nbd2 [begins an important thematic maneuver. The c3 pawn has helped support the center, so the knight uses another development square to reach f1. From there, the knight can fight for strong squares such as d5 or f5 jumping to squares g3 or e3].



12...Bd7 13.Nf1 Rfe8 14.Ne3 g6 [Curbing the strong Nf5 jump that will play off the Black weaknesses (d6, g7, e7, h6)]. [14…cxd4 15.cxd4 Rac8 is also logical, although White can defend the side well with 16.Bd2 then counterattacking with Rc1 or Bb3]. **15.dxe5** [An interesting decision. Of course closing the center with d5 and gaining space was also possible. But Fischer has in mind exploiting the weak d5 square and does not want to give it up]. **15...dxe5** [The central structure has been fixed and, therefore, White can now seek a lateral attack without fear of a central backlash from Black. Also d5 can be exploited].

16.Nh2 [Another important maneuver that Fischer used successfully on many occasions. The knight gives way to the queen on the kingside and also seeks the move Ng4 (now that Nh4-Nf5 was not possible)]. 16.Nd5 also offered an interesting advantage with the last pawn supported 16...Nxd5 17.exd5 f6 18.b3 consolidating the center and also preventing the black knight being activated by c4].



16…Rad8 17.Qf3 [All white pieces go to the kingside] **17...Be6 18.Nhg4** [beginning active operations] **18...Nxg4 19.hxg4!** [An interesting decision. The "h" file has been opened, and White can take advantage of looking for the weakness of point h7 with maneuvers g3–Kg2–g5–Rh1 (a plan employed by Fischer on more than one occasion). On the other hand, file "d" is there for Black, but there's no real way to take advantage of it because all the squares are well

controlled].

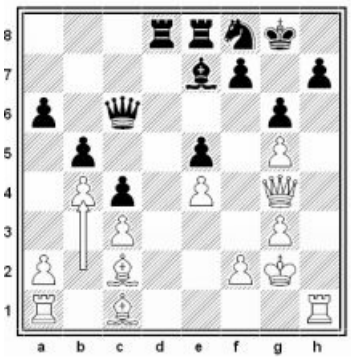
[19.Nxg4 was not as strong as it allowed the replacement of pieces and also the important knight fighting for the d5 square 19…Bxg4! 20.hxg4 c4=].

19…Qc6 [A little slow] [19…Bg5 tactically failing by 20.Nd5 Bxd5 21.Bxg5 gaining material] **20.g5** [20.Qg3! could be more accurate. Threatening e5 and preparing the g5 advance].

20…Nc4 [Now this exchange of knights arrives too late] **21.Ng4 Bxg4 22.Qxg4** [The g5 pawn is now powerful and the plan is threatened g3-Kg2-Rh1. The plan seems slow, but we must remember that closed positions allow these longer maneuvers in the absence of central counter-punches].

22...Nb6! [Stemming the White a4 reaction and moving the knight to defend the weakness of h7. A profound defense] [22...f6? eliminates g5 pawn, but seriously deteriorates castling 23.gxf6 Bxf6 24.a4! another major move in the Spanish to open lines and improve the white pieces (in this case mainly the rook on a1) 24...Nb6 25.axb5 axb5 26.Be3±].

23.g3 [23.Re3 followed by Rh3 was also natural] **23...c4** [23...Nd7 24.a4 c4! *(24...b4? 25.cxb4 cxb4 26.Bb3 ±)* 25.axb5 axb5= **24.Kg2 Nd7 25.Rh1 Nf8** [Black has continued to defend *in extremis* point h7, so Fischer seeks new weaknesses. The a4 break can allow new issues, opening lines on the queenside. But it can still be answered with b4. Therefore...] **26.b4?** [The White reaction removes the Black b4, and seeks the blow a4 (thematic and repeatedly played in many Spanish lines)].



26…Qe6 [26…cxb3? [27.Bxb3 the bishop would be powerful again now on the big diagonal. And with no opponent! 27…Qxc3 28.Be3 gives a dangerous initiative to White, as it can move with Rc1, has the strong b3 bishop and the attack with Qf3]. **27.Qe2** [the queens are maintained in order to achieve the attack]. **27…a5 28.bxa5 Qa6 29.Be3 Qxa5 30.a4** [Finally, comes the break for new pieces entering the attack]. **30...Ra8?** [This move allows the entrance of the white rooks].

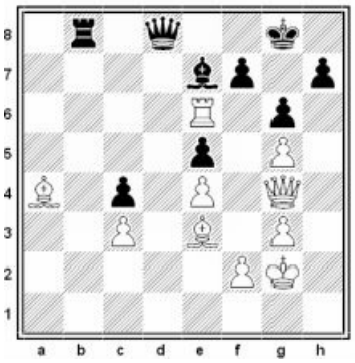
31.axb5 Qxb5 [31…Qxa1? 32.Rxa1 Rxa1 33.Qxc4± White not only has two important

passed pawns, but also the pressure with Bb3 will be very great; 31...Qxc3 32.Rxa8 Rxa8 33.Rc1 Ne6 34.Bd1 winning the c4 pawn, and with good chances of victory thanks to the b5 passed pawn and a strong light-squared bishop occupying the diagonal a2-g8].

32.Rhb1 Qc6 33.Rb6! [Now the rooks invade the weak side of the black queen]. **33...Qc7** [33...Qxb6 34.Rxa8! important intermediate 34...Qc6 35.Ra7! is the strongest. It keeps the tension and Ba4 threat *(35.Rxe8 Qxe8 36.Qxc4)*] **34.Rba6 Rxa6 35.Rxa6±** [the entrance of the white pieces on the queenside enables an elegant finish for Fischer].

35...Rc8 36.Qg4 Ne6 37.Ba4 [37.Rxe6 fxe6 38.Qxe6+ Kh8 39.Bb6 was already strong 39… Qb8 40.Qxe7 Qxb6 41.Ba4 and bishop reaches the attack via d7. Older black pieces cannot fight against the tandem queen + bishop (each piece by each color) 41...Qd8 42.Qxe5+ Kg8 43.Qe6+ Kg7 44.Bc6 and Black is lost] **37...Rb8 38.Rc6** [setting an interesting trap] **38...Qd8??** [losing directly] [38...Qd7!! was the only Black defense, and is based on tactical defensive resources. At the moment it can prepare the idea Nf4 (and defend e6); 38...Qa5?? also fails by 39.Rxe6 fxe6 40.Qxe6+ Kf8 41.Bc6 followed by Bd5].

39.Rxe6! [The decisive blow. The black rook clumsily stems the flow of white bishops].



39...Qc8 [Black puts trust in this pin, but was met with an unpleasant response].

[39…fxe6 40.Qxe6+ Kf8 41.Qxe5+ - with a checkmating attack. The queen enters by h8, but before the bishops are placed on c6-d5 and d4]. **40.Bd7!+-** [Black leaves because the bishop cannot be captured due to the discovered attack: Rxg6+] [40.Bd7! Qxd7 41.Rxg6++ - winning the queen]. **1-0**

This game, despite not being recent, should be a starting reference (**starting model**) of any player who wants to use the Spanish Opening. In it, important ideas are seen:

1) Idea c3, to support d4 advancement, and also saving the light-squared bishop (key piece in this opening).

2) Importance of move h3. If we want to move with d4 we must avoid pressure after the

Bg4 pin.

3) Transfer maneuver Nbd2-Nf1 to reach g3 or e3, and so fight for key squares such as d5 or f5.

4) Set the center with d5 or dxe5 if you want to take advantage of a lateral attack on the kingside.

5) Maneuver by moving pieces to attack Nh2-Ng4 or Qf3.

6) Capture hxg4 to attack by the "h" file after g3–Kg2–Rh1 or Re3–Rh3.

7) Strong square on d5 can be exploited by the knight.

8) a4 Rupture for opening lines also on the queenside, and allowing activity and the entrance of the a1 rook.

So many ideas in one game! The creation of a collection of model games will give us general vision of the opening, and also show us more clearly all the strategic and tactical issues that we should know. Thus, the study of the "most current theory" will be easier].

DO NOT RECREATE THE WHEEL.

All players have a creative factor we like to exploit. We have the illusion of presenting our own ideas in the game and also that these ideas can lead us to victory. However, we must be aware that what we think we have created (or at least part of it), was probably used previously.

So, let us be realistic and use the knowledge and precise game of the great players of history in our favor.

During my chess life on many occasions, I have been in the position to take great advantage of prior knowledge and study from the great players. I will relate a very illuminating occasion:

During a period when learning the openings, I decided to incorporate some of the lines of the English Opening. With this opening, I was expanding my repertoire for the queen's pawn (1.d4) and obtaining new ideas. Of course, the first thing I did was start studying the great players that used it: Kramnik, Kasparov and some other classical players... And also the great player of maneuvers and profound positional play, Ulf Andersson.

I will present, first to you, a game of this great player, so you can compare the strategies Ulf used with those that I myself used many years later. Another different game, another opponent, another time, but the same ideas that can be recycled and help us improve from this moment forward from existing strategies and plans.

Let's see if this study was productive.

Andersson, Ulf (2600) - Sokolov, Andrei (2645) [A30]

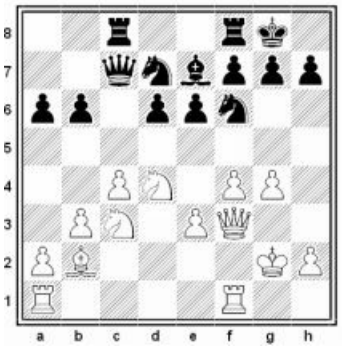
Bilbao, 1987

1.Nf3 Nf6 2.c4 b6 3.g3 c5 4.Bg2 Bb7 5.0-0 e6 6.Nc3 d6 7.b3 Nbd7 8.Bb2 Be7 [After a

doubly quiet *fianchetto* game (Bb2, Bg2) Ulf begins to follow his plan] **9.d4 cxd4** [9...0-0 would meet with 10.d5 where White gets a major space advantage and also Bb7 can remain closed.] **10.Nxd4** [accepting the exchange of the castling bishop, but, in exchange, White is attempting to exploit the weakness of the square c6] **10...Bxg2 11.Kxg2 Qc7 12.e3** [important move. The light diagonal h1-a8 is open and the black queen can try to use it. Therefore, the white queen comes to the important square f3] **12...a6 13.f4** [another subtle move. The e5 square is controlled and, thus, the white queen on f3 will be stronger, not being attacked by the black knights from the squares e5 or g5].

13...0-0 14.Qf3 Rac8 15.g4 [With good central control we can take advantage of the progress of the kingside pawns. It is important that this preliminary central control occurs. If you notice, any possible ruptures of Black are controlled: both b5, as Black advances d5 and e5 (will weaken the d5 and f5 squares), so the attack on the kingside can be carried out.

The idea is to win White space on the kingside and that, after this gaining of space, the bishop on b2 acquires greater strategic presence and becomes increasingly powerful].

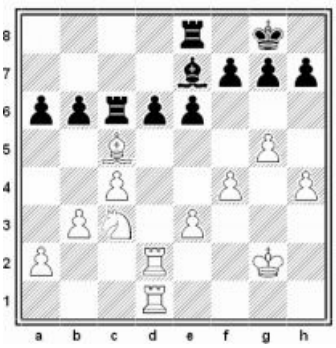


15...Nc5 16.g5 Nfd7 17.Rad1 Rfe8 18.h4 Bf8 19.Rd2 Nb8 20.Rfd1 [The White control is great, both on the kingside and in the central file. From this moment, we just need to make more active operations to increase pressure] **20...Nc6** [Black seeks, through a series of changes, to stop the attack on his king. But the endgame leaves it with no options]. **21.Nxc6** [Starts an important sequence of exchanges] **21...Qxc6 22.Qxc6 Rxc6 23.Ba3!?** [White can no longer attempt such a simple attack on the black king because there is no queen and in its planned attack, this piece was fundamental. But after the exchange of queens, the game has entered a finale and White performs a readjustment of its plan, now moving all its focus to the weak d6 point: a backward and weak pawn, in addition to being stuck in a semi-open file].

23...Be7? [Oblivious to the opponent's plan] [23...Nb7 left the knight misplaced, but avoided the exchange].

24.Bxc5 [Another important exchange to demonstrate the superiority of the white knight on

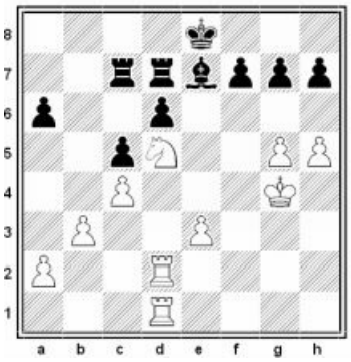
the black bishop, and the white rooks seeking their opportunity to enter file “d”. Following these changes, White has caused a positional imbalance in favor of the knight, which will seek to settle in light squares that cannot access any black piece].



24...bxc5 [24...Rxc5 loses the pawn 25.Ne4 Rc6 26.Nxd6; 24...dxc5 25.Rd7 the entrance by file “d” is decisive. Preparing to double on the seventh and activate the king: Ra7-Rdd7-Kf3. The control is complete]. **25.Ne4 Rd8** [passively, Black has defended the d6 point. And as explained in the next chapter on the middle game, it's time to find new weaknesses. There are times that with one weakness alone it is not possible to win. And this is a clear example].

[26.Kf3 Kf8 27.Kg4! [The king as part of the attack. In order to seek new lines of entry for the white pieces, an f5 rupture is prepared. Meanwhile, Black is tied up] **27...Ke8** [27...g6 fighting against f5, but after 28.h5 Kg7 29.Rh1 White moves its rooks to the "h" file] **28.f5! exf5+** [leaves a serious weakness on d5, which the knight will use, however, it was not easy to maintain tension]. [28...Kf8 29.f6 gxf6 30.gxf6; 28...Rd7 29.f6 gxf6 30.Nxf6+!? (30.gxf6 Bf8 *(30...h6 31.Kh5 Bf8 32.* Nc3 and now the invasion by file "g" (that's how the space advantage contributes) 31.Ng5) 30...Bxf6 31.gxf6 and now White enters with Kh5-Rg1].

29.Kxf5 Kf8 30.Kg4 Ke8 [Black's outlook is bleak. The d5 square is a great outpost for the knight, and the "f" file is a valuable positional factor to perform the doubling of the rooks] **31.Rf1 Rd7 32.h5 Bd8 33.Rfd1 Be7 34.Nc3 Rcc7 35.Nd5** [preparing the final entry].



35...Rb7 36.Rf1 Bd7 32.Rdf2 Kf8 38.g6 [All pieces are well placed, so that the final rupture arrives] **38...h6 39.Rxf7+ Rxf7 40.Rxf7+ Rxf7 41.gxf7 Kxf7 42.Kf5** [there were other ways to win, but the difference between the minor pieces and the superiority of the white king should seal the fate of the game. Just need to see how to take advantage of the light squares for the entry of pieces] **42...Bh4 43.b4!?** [It has to create a passed pawn to win: one of the two possible general strategies to win an endgame, as explained in the endgame chapter].

43...cxb4 44.Nxb4 a5 45.Nd3 Bd8 46.e4 Bb6 47.a4 [47.e5 already created a decisive passed pawn on "c"] **47...Ke7 48.Nf4 Bd4 49.Ne3 Bc6 50.c5 dxc5 51.Nxc5 Kd6 52.Nd3 Ba1 53.e5+ Kd5 54.Nf4+ Kc4 55.e6 Bf6 56.Ng6** [and Black left because of the strong e7 threat] [56.Ng6 Kb4 57.e7 Bxe7 58.Nxe7 Kxa4 59.Nc6 Kb5 60.Nxa5 Kxa5 61.Kg6 Kb6 62.Kxg7 Kc7 63.Kxh6 Kd7 64.Kg7 promoting]. **1-0**

Now compare the previous game with the following:

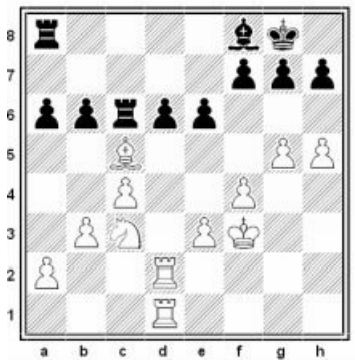
Herraiz Hidalgo, Herminio (2443) - Garza Marco, Sergio (2378) [A30]

Championship of Spain (Cala Mendia, 2001)

1.Nf3 c5 2.c4 Nf6 3.g3 b6 4.Bg2 Bb7 5.0-0 e6 6.Nc3 d6 7.b3 Be7 8.Bb2 Nbd7 9.d4 cxd4 10.Nxd4 [Let's implement the studied plan. First, we proceed to weaken the c6 square]. **10...Bxg2 11.Kxg2 Qc7 12.e3** [the queen seeks the square f3 to control the diagonal and before consolidates f4 with e5]. **12...a6 13.f4 0–0 14.Qf3 Rac8 15.g4** [with the Black central reactions b5, d5 and e5 well controlled, White is unleashed to gain ground on the kingside and expel the f6 black knight to open the large diagonal].

15...Nc5 16.g5 Nfd7 17.Rad1 [Central control with rooks so that Black cannot counter. Point d6 can be an important weakness]. **17...Rfe8 18.h4 Bf8 19.Rd2 Qb8 20.Rfd1** [Doubling rooks before launching the attack with h5] **20...Rc7 21.h5 Qa8** [Black tries to blunt the attack with the exchange of queens, but the endgame is still poor because of the great pressure by the central file and the lack of clear counterplay by Black] **22.Qxa8 Rxa8 23.Kf3** [the king improves his position to seek the advancement of the pawns].

23…Nb8 24.Ba3 [Well-known maneuver to press c5 (seeking the exchange at the right time) and also on d6]. **24...Nc6** [finally, Black looks for exchanges to be activated, but now we can already see that the endgame is delicate for Black by the weak d6 point and strength of the knight in front of the enclosed bishop] **25.Nxc6 Rxc6 26.Bxc5**



What does this Bxc exchange remind you of?

26…bxc5 27.Ne4 Rd8 28.h6 [The ruptures arrive to weaken Black's position. We seek a second weakness (to add to the d6 point) to be able to unbalance the game].

28...Be7 [28...gxh6 was losing for Black, because file "g" is now stronger for the white rooks. For example 29.Rg2 hxg5 (29…Kh8 30.gxh6 preparing the entry with Rdg1–Rg8 30…Be7 31.Rg7 Rf8 32.Ng5 and Black is tied up at the endgame *(32.Ke2* is also strong, preparing Ng5 and Rf1 to enter f7*)* 32...Bxg5 33.fxg5 no black rook can move and all that remains is to enter into the space with the white king and prepare the e4-e5 rupture) 30.Nxg5 Bg7 31.Rdg1].

29.hxg7 Kxg7 30.Kg4 [And finally, on move 30, arrives another idea already studied! No need to memorize complex and lengthy theoretical sequences and others as long as you know and understand the ideas, maneuvers and favorable exchanges that we can apply in positions] **30...h6 31.gxh6+ Kxh6 32.f5** [finally White is going to obtain the d5 square for the knight or reduce the weakness of d6].

32…Rg8+ [32…exf5+ 33.Kxf5 leaves the black king on the verge of checkmate with Rg2-Rh1 and d6 and d5 and severely weakened 33...Rg8 34.Nxd6 Rg5+ 35.Kf4] **33.Kf4 exf5 34.Nxd6** [Black weaknesses finally fall and White gets a winning finish] **34… Bg5+ 35.Kf3 Kg6 36.Rd5 Rh8 37.Nxf5** [with clear pawn advantage and good activity of the pieces that White subsequently imposed] **37…Rh2 38.Rg1 Re6 39.Rxg5+** [not the best, but probably did enough to win] [39.Rxc5 was better, and if 39...Rxa2 *(39…Rh3+ 40.Ke2)* 40.Nh4+ winning the bishop].

39…Kxg5 40.Nd4+ Kf6 41.Nxe6 fxe6 42.Rxc5 Rxa2 43.Ke4 Rb2 44.Ra5 Rxb3 45.Rxa6 Rc3 46.Kd4 Rc1 47.Ra3 e5+ 48.Kd5 Kf5 49.Rd3 Re1 50.c5 e4 51.Rc3 Rd1+ 52.Kc4 Ke5 53.Kb4 Rd8 54.Rc4 Rb8+ 55.Kc3 Rc8 56.c6 Rc7 57.Kb4 Kd6 58.Kb5 Rc8 59.Rd4+ Ke5 60.Kc5 Kf5 61.Kd6

1-0

UNDERSTAND MORE; MEMORIZE LESS

We are almost reaching the end of the chapter, so I propose you take your board and you

check this game without comments.

Karjakin, Sergey (2660) - Anand, Viswanathan (2792) [B90]

Corus, 2006

1.e4 c5 2.Nf3 d6 3.d4 cxd4 4.Nxd4 Nf6 5.Nc3 a6 6.Be3 e5 7.Nb3 Be6 8.f3 Be7 9.Qd2 0–0 10.0–0–0 Nbd7 11.g4 b5 12.g5 b4 13.Ne2 Ne8 14.f4 a5 15.f5 a4 16.Nbd4 exd4 17.Nxd4 b3 18.Kb1 bxc2+ 19.Nxc2 Bb3 20.axb3 axb3 21.Na3 Ne5 22.h4 Ra5 23.Qc3 Qa8 24.Bg2 Nc7 25.Qxc7 Rc8 26.Qxe7 Nc4 27.g6 hxg6 28.fxg6 Nxa3+ 29.bxa3 Rxa3 30.gxf7+ Kh7 31.f8N+ Rxf8 32.Qxf8 Ra1+ 33.Kb2 Ra2+ 34.Kc3 Qa5+ 35.Kd3 Qb5+ 36.Kd4 Ra4+ 37.Kc3 Qc4+ **0–1**.

A spectacular game!

If you are a player who likes the Sicilian Defense, and particularly the Najdorf Variation, you will always dream of being in a game of this level and magnificence. Brilliant sacrifices, until reaching the opponent’s king and finishing the game.

Of course, this game can be a good starting model on some of the important ideas of this defense. But let's face it, within a month you no longer remember what exactly were the first 15 to 20 moves, much less the climax at the end.

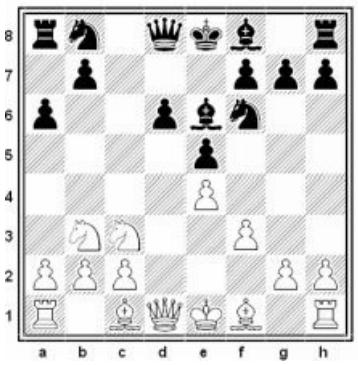
So we better understand the ideas behind the moves of the game and we can play the Najdorf Variation with greater assurance of success.

Karjakin, S - Anand, V [B90]

Corus, 2006

1.e4 c5 2.Nf3 d6 3.d4 cxd4 4.Nxd4 Nf6 5. Nc3 a6 [the Najdorf Variation is raised] **6.f3** [Starting one of the most aggressive schemes for White against the Najdorf Defense (the English attack). The f3 move not only defends the center, but White intended castling long and gets a strong attack on the kingside with g4–g5–h4 etc.].

6…e5 [An interesting decision. White sets the center, space is gained and it dislodged the opponent’s knight from the center. In contrast, it weakens d5 and the d6 pawn remains at the back. White’s moves that follow intend to fight these weaknesses] **7.Nb3 Be6** [the most flexible. The weak d5 is controlled (so the strong white knight does not arrive) and even the d5 rupture can be strong if Black gets it under favorable conditions. In addition, Black will seek his counterplay on the queenside, attacking the white king with advancing pawns "a" and "b" to open lines and moving pieces to this side. Of course, the semi-open file “c” is key in all Sicilian lines].



8.Be3 Be7 9.Qd2 [White will castle first and then launch its pawns] **9...0-0 10.0–0–0 Nbd7** [important development of the knight. Why does the knight not activate by the natural c6 square?

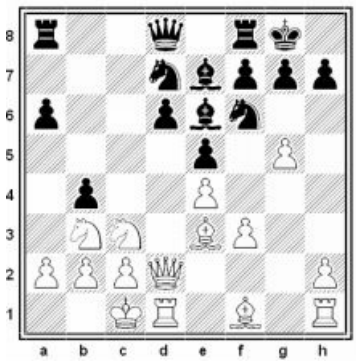
1) Defend the other knight, so White cannot bring about exchange g5-xf6 to hold the key square "d5."

2) The knight has a great circuit with Nb6–Nc4 (leveraging the strength of the semi-open file “c”.

3) File "c" is clear for larger white pieces].

11.g4 b5 [Each side starts operations on the side of their opponent's king] **12. g5** [key moment. How to follow? There are two major options: a) jump the knight to h5 and b) counter with b4].

12...b4!? [Anand launches into the most incisive idea. The bayonet attack of both players shows a very direct game. You have to be quick to get the opponent's king. Black approaches the bxc3 attack that would attack the white queen]. [12...Nh5 is the alternative, that has also been tested. The disadvantage of Black is that it has lost control of d5, but, on the other hand, now the knight on h5 stops White's attack and, also, square f4 remains weak].



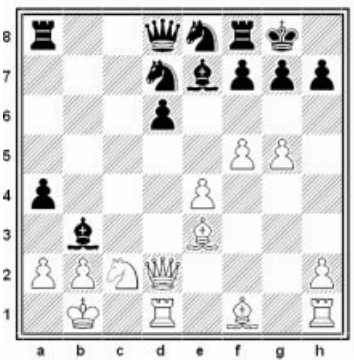
13.Ne2 [13.gxf6 not gaining material 13...bxc3 14.Qxc3 *(14.fxe7 cxd2+* with check*)* 14… Nxf6 15.Na5 the only move to justify the White game. Note that White has lost strength in his

attack on the kingside and also Black could now press through the file "c" or start the advance with d5 15…Rc8 16.Nc6 Qc7 17.Nxe7+ Qxe7 18.Qa5 Rc6 White has the bishop pair, but Black presses through "c" and has stopped the attack on the White kingside. The position is sufficiently active for Black; 13.Nd5 Nxd5 14.exd5 Bf5 weaknesses of d5 and d6 have disappeared with the changes, and Black can now take advantage of its attack on c2 and the a5-a4 advance].

13…Ne8 [The knight momentarily defends d6, but also the black pieces go to the queenside] **14.f4** [most incisive] [14.Qxb4 only accelerates the Black attack 14...a5 15.Qd2 a4 16.Na1 Bxa2 *(16…Nc7)*] **14…a5 15.f5 a4!** [Brilliant idea! Black does not want to exchange their light-squared bishops on b3 and prepares a strong attack axb3-bxa2] **16.Nbd4** [the main line, taking advantage so that then the material is recovered] [16.fxe6 axb3 17.exf7+ *(17.exd7 bxa2)* 17…Rxf7 18.Kb1 *(18.cxb3 Rxa2)* 18…bxc2+ 19.Qxc2 Bxg5 the position maintains its complexity and Black can be happy with its counterplay].

16…exd4 17.Nxd4 [At first glance, the position may seem favorable to White. Not only will it recover the piece, but it threatens the strong jump Nc6. But the Black idea is clear; we must open the White castling at all costs. The presence of opposite castling invites us to a quick attack on our strong side]. **17…b3!** [17…Bxa2?? 18.Nc6].

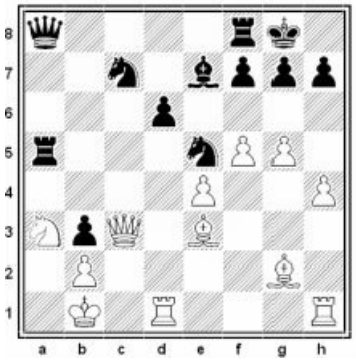
18.Kb1 [18.fxe6?? would be disastrous 18…bxa2; 18.Nc6?? bxa2; 18.a3 bxc2 19.Re1 *(19.Kxc2 Ba2 20.Nc6 Rc8; 19.Nxc2 Ba2)* 19…Ba2 20.Nc6 Nc5 21.Nxd8 *(21.Bxc5 Bxg5 22.Be3 Bxe3 23.Rxe3 Qb6)* 21…Nb3+ with good Black advantage 22.Kxc2 Nxd2 23.Nc6 Rc8] **18…bxc2+** [opening the castling position] **19.Nxc2** [19.Qxc2 Rc8 20.Nc6 Rxc6 21.Qxc6 Ne5 and saves the e6 bishop 22.Qxa4 Bd7 Black has advantage] **19…Bb3!** [Another bright idea. It will lose the bishop but open up White's castling].



20.axb3 axb3 21.Na3 [Follows the complexity of the position. White has closed file "a" for the moment and also prepares its game by light squares with Bc4. For Black, it is time to stop this threat and continue moving pieces to attack].

[21.Nd4 Ra1+! open file "a" is decisive 22.Kxa1 Qa8+ 23.Kb1 Qa2+ 24.Kc1 Qa1#].

21…Ne5 [21…Qc8 is the other logical option to fight against Bc4. In addition, the "bad" bishop e7 can be improved with Bd8–Ba5 or Bd8–Bb6, again with thematic sequence maneuvers] **22.h4 Ra5 23.Qc3 Qa8** [Important idea! Black attacks the e4 pawn, but mostly transferred another piece to the file of attack. Thus, it also allows the passage of the f8 rook to reach the important c8 square] **24.Bg2 Nc7!!** [Brilliant interpretation and a sledgehammer at the time this game was played. The knight threatens by moving itself to the attack. When captured, Black wins as time considerations in the attack and deflects the defensive white queen].



25.Qxc7 Rc8 26.Qxe7 Nc4! [Another blow, and fulfilling a Sicilian thematic maneuver. Now is the a3 knight, which will be captured and thus the king is without defenders] **27.g6** [27.Bc5 Rxa3!! 28.bxa3 *(28.Bxa3 Nxa3+ 29.bxa3 Qxa3)* 28…Rxc5 with the demolishing attack after Nxa3] **27…hxg6 28.fxg6 Nxa3+ 29.bxa3 Rxa3** [White must now sacrifice material to avoid checkmate, but even that is not enough].

30.gxf7+ Kh7! 31.f8N+ Rxf8 32.Qxf8 Ra1+ 33.Kb2 Ra2+ 34.Kc3 Qa5+ 35.Kd3 Qb5+ 36.Kd4 Ra4+ 37.Kc3 Qc4+ 0–1

[And Karjakin resigned before checkmate from the opponent. A spectacular attacking game, but based on simple and clear concepts of the Najdorf Variation:

1) Central Control (e5 reaction and of the key d5 square).

2) Taking advantage of the semi-open file "c", as much with greater pieces as activating the knights on key squares.

3) Opening lines with the bayonet attack (b5–b4–a5–a4–b3).

4) Transfer pieces to the attack.

5) Finally, exact calculation in the final sacrifices].

Once we understand in depth all the ideas of the game, we can develop them into other similar positions, find the differences and similarities in the position each time we use this defense, and who knows? It may make for a spectacular game sometime.

You must trust yourself and, if you understand the ideas of each of your openings, then you'll

naturally find the best moves on the board.

So it is, when you understand in depth and memorize a little less.

III. Build your opening repertoires with pieces and your mind

The final moment arrives and we finally get to work with our study of the opening. Above all we must be aware of the resources we have to prepare and also the direction in which we want to focus our study.

Previously, we took some important steps when studying our favorite lines, but we must also consider the following tips:

1) *How much time you can devote to study?*

All of us have engaged in the studying of a new language or taken a course for an activity or hobby. We must be aware of the "real" time we can spend on the study, so you can organize this time into the different parts of your study. It makes no sense to want to play hard theoretical positions if our hours of study are minimal.

2) *What kind of positions do you want to achieve?*

A common mistake that people make is to play a repertoire of openings unrelated to their style of play. If we are aggressive and we want an ambitious game we must surely employ sequences or active openings (Sicilian Grunfeld, Benoni, King's Indian...). While if our game is stronger initially we find quieter or positional openings (Caro-Kann, Nimzo-Indian, Queen's Gambit...).

But also, we must not only think about what kind of style we have, but in the real time that we employ for studying. So we will think twice if we want to find more-complex lines of learning or study more schematic lines, which will result in less time available. So, then, we must consider these two aspects before choosing what sequence we are going to employ.

3) *Understand the character of the position. To what do you aspire?*

This can be answered based on previous points. The compilation games model that requires 8-10 games on an opening or defense will give a great global vision of the ideas of this opening and, with it, a good beginning for us to focus our games correctly.

4) *Experts*

I have already explained this idea earlier. It is important to know and use the games of the great players of history. Therefore, when we begin to study an opening/defense, it is important to know who are the experts on these lines.

These "experts" are the best at knowing all of the ideas, plans and subtleties of our openings,

and will be great teachers to show us how to properly play these lines. So if we want to employ:

- King's Indian Defense, study classical games of Kasparov, Fischer, Gufeld and more recently, for example, Radjabov or Nakamura.
- Najdorf Defense, we will study Najdorf, Polugaevsky, or more recently Kasparov, Anand, Gelfand...
- English Opening, we will study positional players like Kramnik, Karpov and Andersson, and others like Kasparov with a slightly more aggressive vision.
- Spanish Opening, we will study the maneuvers in the games of Karpov, Anand and Kasparov, among others.
- French Defense, studying classical players such as Korchnoi or Uhlmann, or others a little more current such as Volkov, Morozevich or Paco Vallejo.

Therefore, before understanding the most critical or modern lines of our openings we should take a trip through the games of the great experts and thus assimilate the ideas and most basic and effective plans.

5) *Middle and endgame relationship*

The relationship between the different phases of the game is clear. The openings are largely marked by pawn structures that arise, and based on them we study the various plans, not just a middle game, but also the emerging thematic endgame, the most repeated.

I hope that with all this general focus, you have clearer ideas and already know where to start and how to guide your study in the wonderful world of openings.

b) Middle game and chess technique: that inexplicable universe

I. The method for evaluating positions in five steps

In order to implement that which is explained in section "The Seven Keys to Play Better, in order. Think properly", you must know how to value a position where the material is equivalent; i.e., when neither player has a material advantage. There are many ways and authors recommend how to perform this activity, and surely all of them are complementary. But in *The Zugzwang Method*, I want to introduce a simple way to do it that will allow you to develop orderly thought, and with practice you can proceed to automate and even try other methods if you consider it advisable.

All your strategy should always start from a positional value. We have heard many times: you cannot know how to go somewhere if you do not know where you are. Therefore, after adequately assessing the threats posed by the move of your opponent and becoming aware of how it affects things and how it changes the position, it is time to stop and evaluate. How accurate this assessment is will depend on the effectiveness of your plan.

But first, I must tell you that everything is not so easy. Chess has enormous complexity, rules full of exceptions and exceptions to the exceptions. But the thing on which you must have clarity, is that it is possible to perform a precise positional evaluation, although not easy, and that when that assessment is exact it means that the rules governing chess have been interpreted correctly. Therefore, there is a kind of general randomness or an uncontrollable chaos in those standards. We can encounter them a lot. What happens is that some players manage to encounter them more than others and therefore apply them better. What is certain is that there are rules in chess and those rules work 70% or 80% of the time.

How should you evaluate a position? What steps do you have to follow?

FIRST: Do positional or tactical threats exist?

This is closely related to the step that was previously explained (that of always thinking if there is any threat in the move of your opponent). If a "deadly attack" is going to befall you, your pawn structure being intact and having two more pieces does little for you.

The tactical threats usually consist of gaining material or attacking the king. Positional threats are more subtle, often not so obvious because, statistically, they generate less direct damage and their effects are only apparent in the long term. But they are of one kind or another, so we must always question this and then assess the severity of damage that our opponent wants to or can cause us.

SECOND: The safety of the king

The king's safety is probably the most important factor in chess. If the king is in an unsafe place, any other advantage may be insignificant. Therefore, this is what you have to evaluate second. How can you do it? By answering the following questions: Is my king within reach of any piece? Is it covered or protected by pawns? How can it possibly be reached? How fast can it be reached? Does your king have any escape route in the event of an attack?

Additionally, you must make a comparative analysis of your king against the opponent's king. Sometimes, we tend to be too optimistic about the situation of our pieces just because they are ours, and we commit great injustices with positional value.

THIRD: Pawn structures

Pawns structures are elements closely related to the safety of the king, and what we will analyze below. Besides, they directly affect the assessment of other positional factors. That is to say that the configuration of our pawns will determine the relative value of our pieces.

This analysis we perform both generally and particularly: First, we perform a set analysis, trying to identify whether there are pawn structures that already indicate to us how we should play according to typical strategies. This includes identifying the types of center (static, dynamic, mobile, open and closed) and, second, individually analyzing the

peculiarities of the structure; i.e., is there a set of weak squares? Is there any weak square? Is there a weak pawn?

What are the types of typical structures and what should be studied by me? There are many typical structures and the more plans you know of each, the better. But the aim of the book is to separate the wheat from the chaff, so I have classified them into three levels: structures of high, medium and low importance. First of all, it is important to know them and be able to identify them using typical plans. The other two types are less important because their cross-application (i.e., how much of this knowledge can be applied to other phases of the game, or how much of this knowledge can be applied to other openings) is less.

NOTE: However, it is possible that depending on the opening repertoire you play, some of these structures should have a higher prevalence in your study. For example, if you are a Sicilian Dragon Variation player, you should incorporate into your preparation this scheme to the same level as the isolated queen's pawn structure.

- **Typical high-importance structures** (those in which you have to initially focus yourself).
    - Isolated queen's pawn structure.
    - Carlsbad structure.
    - Hanging pawns.
    - Chains of blocked central pawns (d5 and e5 against d4 and e4, or e4 and d5 against d4 and e5). They appear, for example, in the French and King's Indian Defense.

- **Typical medium-importance structures** (you will work on them when you've mastered the above).
    - Dragon formation.
    - Scheveningen structure with a backward pawn on d6.
    - Maroczy structure.
    - Hedgehog structure (very complex structure).
    - Boleslavsky structure (similar to Scheveningen, but with a pawn on e5).
    - Boleslavsky Wall (pawns on c6 and d6 against c4 and d4).

- **Typical low-importance structures**
    - Panov formation.
    - Closed Sicilian (with pawn on d3).
    - Stonewall Structure.

What are the types of weaknesses related to the pawns and what should I be studying?

Even if we could *rank* the pawn structures by topics of study, along with the weaknesses, this hierarchy is much more limited, and dare I say it should be nonexistent. Actually, it is ideal to know all kinds of weaknesses that exist and know the "why" about each one. Knowing these weaknesses, you'll take much less time to master some of the typical plans containing complex structures such as the isolated pawn or Carlsbad structure, but this does not mean that their study should be exclusive: everything is important.

The types of weaknesses are:

- Doubled pawns.
- Fixed pawns.
- Backward pawns.
- Isolated pawns
- Weak squares.
- Sets of weak squares.
- Hanging pawns.
- Pawn majorities against minorities.
- Weakness of a diagonal.
- Weakness on one file.
- Weakness on a rank.
- Lack of space.

FOURTH: Analysis of the pieces

Once we have the pawn structure clear we will analyze the relative value of our pieces. As you know, all the pieces have an absolute value (the scores that we assign them for being the pieces are; for example, the knight three and the rook five points) and a relative value which depends on the position and whose valuation is tremendously important because it will shape subsequent plans.

What steps do you need to take to perform this analysis?

As we did in the analysis of pawns, first analyze the **coordination of pieces**, which will give us an overall view. Being frank, the assessment of the coordination of pieces is very difficult, since it involves having in mind how other factors interact, but we can have an approach by answering the following: can the pieces perform operations by supporting each other? Are there defensive dependencies between them, such that they are protecting each other? Do they share

common goals? Are there pieces out of the game, pieces that are on the board but inactive or enclosed pieces?

Then, we will conduct a **comparative analysis of our pieces** and the opponent's pieces. This itself is very simple, at least the method is, but if you made a good analysis of the pawn structure you will have advanced sufficiently.

This analysis consists of comparing one by one the pieces on the board: our light-squared bishop with the opponent's light-squared bishop, our rook moving on the same side as our opponent's rook, etc. In this way, we will be able to conclude which are our strong pieces and which are weak.

FIFTH: Dynamic evaluation

The dynamism in chess is a difficult concept for new players to grasp. It is something that exists, but is "felt" more than "understood." Dynamism is an idea that clearly has to do with the time in which the game is developed; i.e., with the internal time, with "development time", not the time on the clock. A term attached to dynamism or the dynamics of the position is initiative. And the definition of one or the other is incredibly important. Gary Kasparov himself says:

> *"A temporary advantage may disappear if we waste a single movement, if we miss an opportunity. Time is not won simply by moving faster or taking a shortcut. Time is exchanged for material advantages. A less numerous army can defeat a numerically superior enemy if it can break the weakest side of the enemy. Time for material is the first compensatory exchange of our evaluation system."*

The dynamics in chess is the value of opportunity

Your opponent can have a crushing material advantage, but if it is you who will strike first perhaps all that enormous advantage disappears.

When can we say that our position has a good dynamic?

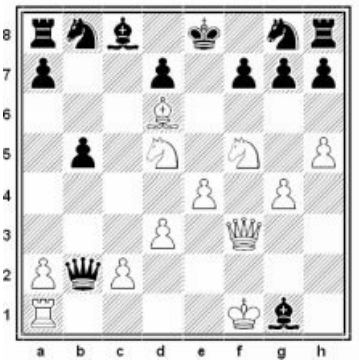
Basically when the following occur:

- The pieces are well coordinated.
- The squares, files, ranks, or critical diagonals are controlled.
- The pieces are in active attack positions.
- Finding ourselves with dynamic pawn structures (usually, those which are not blocked, but also a closed center can be dynamic by the sides).
- It is easier to find dynamic positions in the middle game than in the endgame, but they are not solely dependent on that stage.

To understand what the dynamics consist of, observe the next position. It is a position with a

certain complexity, but do not overwhelm yourself. Let us look at it for a little while.

White to move. Take a few minutes to analyze and familiarize yourself with it.



Anderssen, Adolf - Kieseritzky, Lionel [C33]

London "Immortal Game" 1851

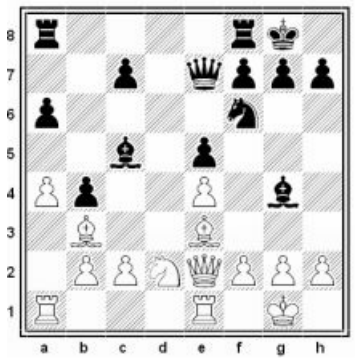
[This item is an archetypal example: Black has a huge static advantage (material advantage), but in return, White has all active pieces and is stalking the black king in the center of the board without good protection. In addition, except for the queen and bishop, all black pieces are in their original positions, where they contribute nothing to offset their dynamic deficits].

19.e5! [Brilliant! Now the knight is threatening a quick entry by g7 followed by the queen who will be able to enter on f7...] **19…Qxa1+ 20.Ke2 Na6** [the strange and unnatural 20...Ba6 was the only way to keep the lively defense burning. 21.Nc7+ Kd8 22.Nxa6 Qc3 23.Bc7+ Qxc7 24.Nxc7 Nc6 25.Nxa8 Black has an almost impossible defense but can fight] **21.Nxg7+ Kd8 22.Qf6+ Nxf6 23.Be7# 1–0**

Once you've assessed the position following this descriptive scheme in five steps, you will be able to define plans and set goals. Until you analyze your position, you should not devise any plan, let alone consider how to move.

To be clear about how to analyze a position, I will share a very complete example of how to do it. This example is chosen very specifically (you'll see why). To get the most out of this, devote 10 to 15 minutes to assess the position following the scheme I've explained.

White to move.



Caruana, Fabiano (2779) - Fressinet, Laurent (2708) [C88]

Grand Prix Paris, 2013

We reach an important position in the game. The game itself begins with the first threats and possible exchanges, and we must be precise to the letter when properly interpreting it. At first glance you might think that Black's position is satisfactory. Black threatens the queen and also can occupy the only open file faster than White with a rook on d8. But beware, there are other important factors that show that White's position is clearly preferable.

Consider the position following our scheme:

FIRST: Do positional or tactical threats exist?

Yes, they exist. Black threatens to take the queen. Is it a real threat? Yes!

SECOND: The safety of the kings

Safety of the kings is approximately equal. Both are castled under a seamless structure.

THIRD: Pawn structures

a) Are there typical structures? Yes! We are in a static center position in which the control of files adjacent to the center will be a key strategy and also increase the relative value of the minor pieces. Why is that the case? Because the center is difficult to change in the middle game and this is the reason why we should care about the other factors (the minor pieces). Along with the strategy of controlling files, we should add another one: shifting our minor pieces to strong squares. From the standpoint of White, they are squares d5 and f5.

b) Other structures and weaknesses. Black's position is full of weaknesses. Not only are the pawns a6–c7–b4 or e5 able to be targets of attack, but also White can leverage strong squares (or those weak to Black) such as c4, a5 or c6. The precise replacement of pieces can demonstrate this advantage.

FOURTH: Comparative analysis of the pieces

a) The **major pieces** are approximately the same, because they have very similar activity.

b) When comparing the **dark-squared bishops**, White is better as its bishop commands more squares than the opponent, and its central pawn is found on a light square (e4). Regarding the light-squared bishops, the value is very similar. Although White has a bishop that clashes with its own center, it is on a very strong diagonal pointing directly against the castled position.

c) Finally, the knights, the key factor in this position. The white knight is clearly superior to the black knight. Why? Because it is more likely to be activated and obtain better squares than its opponent's. It can go to c4-a5-c6... This, in turn, is a consequence of the poor structure of black pawns. As you see, everything is related.

FIFTH: Dynamic evaluation

It seems that Black has a higher dynamic than White because of the threats that are already executed, due to the activity of the bishops and the possibility of being first to control the important file "d." All this would be true if White could not oppose favorable exchanges. The exchanges of active pieces inhibit the dynamics of a position, as discussed below.

After all of the above assessment, White's position is preferable. What will our plan be? Our plan is dictated by the assessment. It will always be in our best interest to exchange pieces in order to deactivate the opponent's dynamic pieces and leave the board unbalanced as long as the relative valuation of the board is in our favor: the comparison of knights.

15.Bxc5! [This capture not only obtains a good square for the queen on e3, but seeks massive exchange of the opponent's pieces in order to obtain the remaining pieces on the board that are in White's best interest] [15.f3 is also possible, although it gives some moves to Black 15...Rad8 16.Rad1! (16.fxg4?? would be disastrous and would ignore the active ideas of the opponent 16...Bxe3+ 17.Qxe3 Nxg4 powerful leap that would be a devastating attack on Black. The idea is that White now cannot avoid the simultaneous attack on d2 and Qc5+ 18.Qe2 Qc5+ 19.Kh1 *(19.Kf1 Nxh2#)* 19…Nf2+ 20.Kg1 Nxe4+ 21.Kh1 Nxd2) 16…Bc8].

15…Qxc5 16.Qe3! [Another strong exchange is made, occupying the exact square. The point c4 is useful for the knight because from there it will point to all the structural weaknesses of the Black position. For this reason, the c4 square should not be occupied by the queen] [16.Qc4 would be convenient if the exchange were required and the white knight arrived on c4, but after 16...Qd6 the knight remains without a jump to c4 and Black counterattacks by the "d" file with the threat Be6 17.Qd3 Qe7 18.f3 Rfd8 19.Qe3 Be6 and after the powerful Rd4, Black gets a great center counterattack].

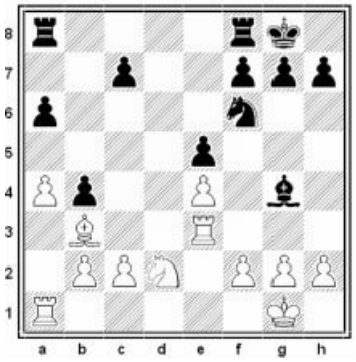
16…Qxe3 [16…Qe7 could avoid the exchange of queens, but still after 17.f3 Be6 18.Bxe6 Qxe6 19.Nb3 the white pieces quickly exploit the weaknesses of Black with the entry of these pieces on c5. Both the queen, pressing b4-c7, and the knight, pressing on a6, having a good base of operations on that square].

17.Rxe3 [Following exchanges, White's idea advances. The endgame is clearly superior because each white piece is better than that of its opponent.

1) The bishop on b3 has a powerful diagonal to press f7, but can also move to c4 or d5 to attack other key points.

2) The knight will jump to c4 (pressing on e5) but also by a5-c6, which has powerful entry squares.

3) The white rooks will be active by the third rank or by file "d" if they can double. Meanwhile, the black rooks should be careful and defend the weaknesses].



17…Rad8 18.Nc4 Rfe8 [the first piece that remains passive in the defense] **19.Na5 Be6 20.f3** [the center remains defended and so the white rook can activate easily. The black knight additionally remains without clear jumps] **20...Rd2** [again it might seem that Black is continuing some activity to compensate for the problem of weak pawns and squares. Nothing could be further from the truth. As the d2 rook is dislodged, the position will show that the Black side is full of difficult to defend weaknesses].

21.Rc1 [A strong move both offensively and defensively. The square c2 is defended if necessary (in view of possible exchanges on b3) but the c3 rupture is also prepared to enter the attack through the file, where it can press on c7] [21.Nc6 is also strong, demonstrating the concrete advantage. 21…Bxb3 22.Rxb3 Rxc2 23.Nxb4 the Black weaknesses are beginning to fall 23...Rd2 *(23…Rb8 24.Rd3!* playing with the weakness of the eighth rank *24…Rxb2 25.Nxa6* the passed and supported pawn on a4 is strong, additionally, c7 will fall *25…Rc8 26.a5)* 24.Nxa6 with decisive advantage, not only in material but also thanks to the powerful passed and supported pawn on a4].

21…Nd7 [21…Bxb3 22.Nxb3 *(22.cxb3* is also strong *22…Rxb2 23.Rxc7)* 22…Rd6 23.c3 after evacuating the rook, the opening of the file is begun in order to activate the rooks and pressure c7] **22.Bxe6 Rxe6 23.Nb3** [first, the strong opponent piece is expulsed] **23…Rdd6 24.c3** […and then the rest of the pieces are activated. Nothing is left of the "apparent" active position of Black in the opening after Bg4].

24…bxc3 25.Rexc3 [Coordination of the white pieces is clearly superior to that of the opponent's pieces, and it's time to start taking advantage of all the weak pawns **25…Rb6 26.a5 Rb5 27.Rxc7 Rxb3 28.Rxd7** [White has won a pawn, but also the white rooks create strong threats (both checkmates on the eighth as well as the attack on the seventh)].

28…h5 29.Rc8+ Kh7 30.Rxf7 Rxb2 [A key moment in the game arrives. Material advantage is important and also the fact that White can attack the Black king or win new pawns. But we must also be alert to the opponent's ideas. The Rd6–Rd1 or Rg6–Rxg2 threats must be taken into account and neutralized. Caruana solves these threats with high accuracy and without giving options to his opponent].

31.Rf5! [Again the illusions of Black activation disappear] **31…Rb1+** [31…Rg6 32.Rxh5+; 31…Rd6 32.h4 Rbd2 *(32…Rdd2 33.Rxh5+ Kg6 34.Rg5+ Kh7 35.Rc7)*] **32.Kf2 Rb2+ 33.Kg3** [with good calculation the White king escapes] **33…Rg6+ 34.Kh3 Rgxg2 35.Rxh5+ Kg6 36.Rxe5!** [so simple] **36…Rxh2+ 37.Kg3** [the king achieves ideal squares such as f4, and gains more material] **37…Rhg2+** [37…Rbg2+ 38.Kf4 Rh4+ 39.Ke3 once the checks cease, it is the moment to capture new weaknesses with Re6 or Rc6] **38.Kf4 Rb5 39.Rc6+** [and Black resigns before losing more material. **1-0**

II. Unbalancing Positional factors: how to understand them

We have seen how to perform the analysis of a position. To correctly assess a position is one of the hardest things that exists in chess. But still we will further complicate things...

After analyzing a position, we observe that there are plenty of positional factors that conflict: it is possible that you have the space advantage, but your opponent is dominating a diagonal and, at the same time, you have two doubled pawns and your opponent has an isolated one, etc. With this "cocktail" of factors, **unbalancing positional factors** arise.

There are elements that stand above all others in a position and rule over the rest. It is as if, somehow, they nullify part of the value of the other factors through their weight, their predominance. At the same time, these types of factors may be temporary or not. That is to say, they may disappear in the short or medium term or they may not.

To win a game of chess, you have to cause imbalances: of material, position... of any kind. You cannot win a game without the prior existence of an imbalance (or several).

This attribute, that of positional imbalance, may be appropriate for any positional factor: a strong knight against a weak bishop in a middle game, a passed pawn, a powerful diagonal... The important thing is to be able to determine whether or not this imbalance exists.

In reality, we don't have a universal rule to carry out this judgment. The only way to improve

competence in detecting imbalances is to increase our chess culture and practice exercises methodically. However, yes we can enumerate a list of possible destabilizing factors that can help detect them:

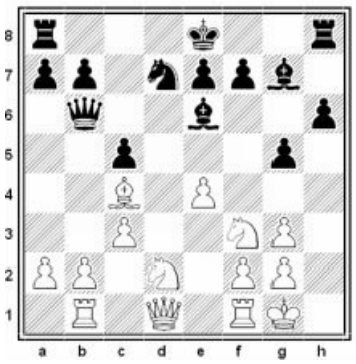
- Lack of security for the king
    - King in the center.
    - King vulnerable due to castling under poor conditions.
- Structural weaknesses
    - Weak squares.
    - Weak pawns.
- Differences in the relative value of the pieces
    - Bishops against knights (usually in open structures).
    - Knights against bishops (usually in closed structures).
    - Pieces out of play (most frequently in enclosed structures).
    - Rooks against bishop or knight.
    - Knight or bishop against rook (usually in closed structures for the knight and open for the bishop).
    - Existence of a piece outside the game (away from the main activity of the play or without mobility).
- Local imbalance of pieces (when in an area of the board there exist, for example, more pieces attacking than defending)
    - Domination of a relevant file.
    - Domination of a relevant diagonal.

Let's see an example in which there is a clear positional unbalancing factor to facilitate understanding of this topic:

Carlsen, Magnus (2850) - Guseinov, Gadir (2634) [A48]

World Speed Championship (Berlin, 2015)

White to move. Dedicate a few minutes to the position.



[The opening is over and has defined the game on both sides. Black with its aggressive advance h6–g5 has won the bishop pair, but on the other hand, the development of Black has been delayed and the queen at b6 may be exposed to attack by the white pieces. However, these details are not the only important issues in the position. The pair of black bishops is not only not good, but can lead to problems and more specifically the bishop at g7 that, at this time, hits a wall at c3-b2 and cannot be improved to another diagonal because of its own pawns. In addition, White can obtain control of all the light squares for its pieces. Including, at the right time, exchanging the e6 bishop, which may be favorable for achieving the knights circuiting on light squares unopposed. Thus, the great Carlsen shows us that among all the factors of the position, the weakness of the light squares is key to the White pressure. Thus begins the idea...

14.Bd5!? [An interesting interpretation. A passage is cleared for the knight to c4 and also it presses onto another light square, b7. The queen also waits for her moment to fill key squares such as a4 or b3 in the attack against the Black weaknesses. All by light squares! And, all the while, the bishop on g7 can only be a spectator of the scene].

[14.Qa4! Was natural and more precise. The queen presses on d7 and also controls squares important for the black queen on file "a" (such as a6, which would stop the Nc4 jump) 14…0–0 (14…0–0–0 would fail (contrary to the possibilities that Black had with the idea 14…Qa6) but after 15.Bxe6 because after 15.Bxe6 the a7 point is indefensible. 15…fxe6 *(15…Qxe6 16.Qxa7)* 16.Nc4 again influencing the weakness of a7, and after 16…Qa6 17.Qxa6 bxa6 18.g4 Black's position is full of weaknesses (isolated, backward and doubled pawns and the inability to fight against strong light squares for knights). The bishop is a spectator at the game produced by light squares 18…Kc7 19.Rfd1 Nb6 20.Nce5±) 15.Bd5 following now with the idea Nc4 15…Bxd5 *(15…Nf6 16.Nc4 Qc7 17.Bxe6 fxe6 18.Rfe1* central control is large and the debility can be punished with Ne3–Qb3. On top of that, again the poor performance of the bad bishop on “g7” that strikes both sides of the structure*)* 16.exd5 with important advantage. The square e7 is now a weakness that can be exploited and also the knights can circuit to reach light squares such as f5 or c4 16…Nf6 17.Nc4 Qc7 18.Rbd1 preparing d6 and if 18…Rfd8 19.Ne3 knight achieves a

jump to f5 and preparing a strong attack on e7 after Rfe1. Again, the light squares cannot be controlled; 14.b4 this move deserves a moment of reflection. It also seems a logical candidate, to open lines and try to reach the black queen. But it is also true that the c5 knight will be able to defend well the pressure through the file and achieve Bg7, finally, playing and becoming a piece that can have an active role. So, this move would only be successful if it gets a particular advantage. A detail that is not produced and the position is not clear after 14…Bxc4 15.Nxc4 Qe6 the black pieces start activating 16.Ne3 0-0 the capture on c5 is well controlled, and Black attacks on e4.

White has powerful jumps with its knight on d5 or f5, but also it is certain that the lack of pieces can help it. For example:

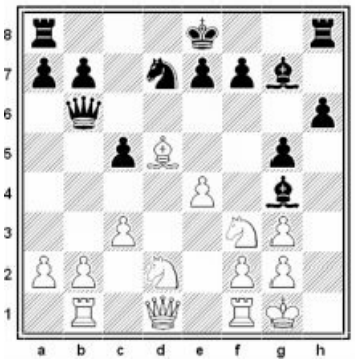
a) 17.Nf5 Rfd8 preparing Nf6 or Bf8 in order to expulse the knight with e6 18.Qd5 Rab8 *(18…Kf8)*;

b) 17.Qd5 Qxd5 18.exd5 c4 the pressure on c3 is attached to the advanced pawn giving a good move to Black. The bishop on g7 is now a powerful piece *(18…Rfd8)*;

c) 17.Nd5 Rac8 defending the double attack on c7 and preparing the expulsion of the strong knight after Rfd8–Qd6–e6.

It is demonstrated that the simplest factor in White's advantage is not based on a direct accosting of the queen, but taking advantage of the bad g7 bishop and the weakness of the light squares].

14...Bg4? [A seriously wrong decision. Black aspires to keep the bishop pair, but an important rival bishop on d5 remains. As if this were not enough, the opponent's idea is not anticipated, which could be stopped with the black queen on a6. The attack by light squares should be taken very seriously, and now the white pieces are even more powerful and have no rival. The only piece that could defend the light squares is away from the defense].



[14...Qa6 was the best option, and perhaps the key move that could be stopped with the precise 14.Qa4. The queen from a6 controls the jump Nc4 and also the leap of the queen to a4 Nc4 and jump of the queen a4 15.Qb3 0–0–0 16.Nc4 *(16.Bxe6 Qxe6 17.Qxe6 fxe6* at least Black

has a solid position despite the structure and will fight for file “d”*)* 16…Kb8 and Black, contrary to the game, stops the tactical ideas on b7 and wants to consolidate the position with Nf6 17.Rfe1 *(17.Na5 Bxd5 18.Qxd5 Qxa5)* 17…Nf6; 14…0–0–0 15.Qa4 Kb8 just in time a7 is defended in order to be able to move the queen if necessary, but after 16.Nc4 Qc7 17.Bxe6 fxe6 18.Rbd1 White is somewhat more comfortable with its knights on light squares and weak pawns on “e”; 14...Bxd5 is a possible exchange, but also gives a comfortable White move. 15.exd5 now the d5 pawn fixes the e7 weakness (in the semi-open file) and the knight wants to move to active squares with Nc4-Ne3-Nf5 (another important light square)].

15.Nc4! [The pieces continue entering by light squares] **15...Qc7** [15...Qa6 now arrives late and can be dangerous to the security of the black king. For example... 16.Qb3 0–0–0 *(16…Rb8* will lose material directly 17.Bxf7+ *Kxf7 18.Nce5+* not only threatening to take the g4 bishop, but also the entry into f7 *18…Ke8 19.Qf7+ Kd8 20.Nxg4* with a devastating attack on the king in the center*)* 17.Na5 b6 *(17…Kc7 18.Qxb7+ Qxb7 19.Nxb7 Rb8 20.Na5 e6 21.Bc4; 17…Qb6 18.Nxb7)* 18.Bb7+ **16.Qb3** [another piece by light squares and the concrete attacks such as b7 and f7 begin (both light!)].

16...0-0-0 17.Na5 [White's attack is developed by light squares; weakened without the black bishops in that area, Black can do nothing. Laying that final blow only requires calculating whether the knight can enter through c6 or not. Carlsen, with precision, ends the game].

17…b6 18.Nc6 e6 [18…Rde8 19.Qa4 with decisive entry through “a”, or simple defending the knight in order to devour Bxf7 19…a5 20.b4 *(20.Bxf7)*] **19.Nxd8 Rxd8** [19…exd5 20.Nxf7 Rf8 21.Qxd5 the key. The queen comes to the defense, material advantage is great and the knight escapes quietly by d6] **20.Bc4** [material advantage is important and we just lack seeing if Black can obtain counterplay on the Black castling. Carlsen stops it cold] **20...Bxf3** [the best attempt, now that the white bishop and queen are far from their king].

21.gxf3 Ne5 [21…h5 22.Kg2 h4 23.Rbd1 similar to the game] **22.Kg2 h5 23.Rbd1** [the central control and activity of white rooks is key to prove that the Black attack is an illusion] **23…Rh8 24.Be2** [White begins to defend the possible weak points. First f3 and then h4 rupture] **24...h4 25.Rh1** [the two rooks have excellent squares to stop the Black counter, and compensation disappears] **25…Kb8 26.Qc2 Qc6 27.Qd2 g4 28.Rxh4** [and Black resigned. Funny how the bishop on g7 was a spectator of the game and was never involved in the game that involved squares of the opposite color]. **1-0**

III. Reinterpreting Steinitz: Strategies for each type of advantage

Steinitz was the first World Chess Champion and the person to whom we owe the creation of the first strategic principles. His theory taught us the importance of the center and development,

the weight of always keeping the king in a safe place and a series of norms closer to philosophy than to technique, that endowed chess with a certain magnetism.

With respect to what is important to us in The Zugzwang Method, Steinitz advocated in a balanced position that we should maneuver with our pieces to destabilize and then go on the attack, when we had an advantage. Together with this principle, he added another, very close, perhaps more difficult to understand in operational terms. It read: "The player with the advantage must play offensively or risk losing it."

The problem with Steinitz's theories, while recognizing their undoubted contribution to chess theory, is that they were too rigid and, today, we must reinterpret them. For example, he divided the types of advantage that existed into two: permanent and temporary. Typifying each of them in a closed way. For example, these were permanent advantages for him: the weakness of the squares, passed pawns, the bishop pair... Steinitz forgot the importance of the dynamism of positions because he played chess from purely static elements.

As you know and have studied in the chapter, dynamism is a very important factor in assessing any position. Therefore, I will help you to integrate the ideas of Steinitz into a new paradigm.

The first step in order to play according to a type of advantage is enhancing the imbalance of a position until said advantage is produced. On this point, I do agree with Steinitz. A balanced position must be unbalanced or we cannot win. Imagine the starting position, the only imbalance is an imbalance in time; White moves first. All other factors are equal: material, structures, center control, relative value of the pieces... We cannot win unless that first initial advantage is strengthened and is transformed into something more important.

Once this has occurred, we will be face to face with an advantage, **temporary or permanent**, but not in the terms that the world champion advocated. It is not a "closed number" of cases; one may find an advantage of any of these types in countless positions, depending on several factors. That is, not only because one of the players counts on a passed pawn, are we going to consider he/she has a permanent advantage (from a static point of view, that of Steinitz. Yes, it could be thought of in that way, since a passed pawn cannot become an "unpassed pawn." It cannot go back), and this is a substantial reinterpretation.

THE PERMANENT ADVANTAGE

The **permanent advantage** is the easiest to play and, therefore, is the first on which I will expound. It is one that endures over time regardless of the specific advantage (if it is for the weak squares, the situation of the king or having the bishop pair). The permanence or transience in time will be the consequence of our opponent depending on whether or not he/she liberates

him/herself from a disadvantage. If our opponent is unable in objective terms, by the nature of the position not because of his/her talent, to counter it, we will face this kind of advantage. We can also identify it because if the possessor does not alter the factors that determine it, that advantage cannot disappear. You will understand this better in the following paragraphs and in the examples below, so don't worry:

I differentiate two types of permanent advantage:

- **The advantage of material without compensation for the opponent**

I would underline the words "without compensation." It is the simplest type of all permanent advantage. It is to have more material than the opponent and that there is no element that neutralizes that advantage (remember what I said about dynamism: a less powerful army can defeat one that is more numerous). For example: it is normal that if we have an extra knight and maintain that material imbalance we will win the game unless there is some element against us (imagine in this case we have no pawns and arrive at the endgame with only a knight and king against king, then stalemate), in which case we would encounter permanent advantage.

- **The permanent positional advantage**

In this case, the material is equivalent, but there are one or more factors that are imposed so predominantly, flipping the positional and strategic assessment for one of the players "completely on its head." That is, one player has a clear advantage in the global nature of the game.

Together with this definition must be added another note, which is it is not possible that the player that does **not** count on a permanent advantage is free of disadvantage, saving, unless the advantaged player modifies the factors that give rise to it.

You'll understand very well with all the examples in this section.

When presented with a permanent advantage, we must implement a series of strategic considerations above the concrete positional assessment. I mean, there are a number of principles that will always give you results when you have to perform in this type of position, regardless of the specific context. Therefore, it is very important that you consider them. I'll list them:

— Do not let your opponent get counterplay unless obtaining counterplay means that he/she loses the game directly.

— Do not turn a permanent advantage into a temporary advantage (volatile). Otherwise, it may be justified to turn a temporary advantage into a permanent one.

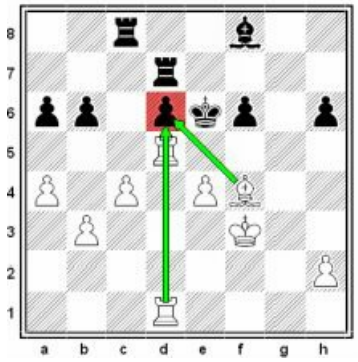
— With only a permanent advantage, you're not going to win. Evaluate the weaknesses of your opponent's position and orient your strategy to exploit them. Start doing it with the weakest point of all and if the pressure on the opponent is not enough, look for a second weakness.

— As a general rule, if you can opt for a permanent or temporary advantage, it is

preferable to opt for the first: it is easier to play and more difficult to lose.

— The **beginning of the two weaknesses** is one of most important in chess strategy. Often, we come to positions where we cannot progress because we need to dislodge the defending forces of our opponent, and the way to do it is not overtly; it is to create a second element that distracts so the position collapses. Look at the following diagram:

White to move. Take a few minutes to analyze and familiarize yourself with it.

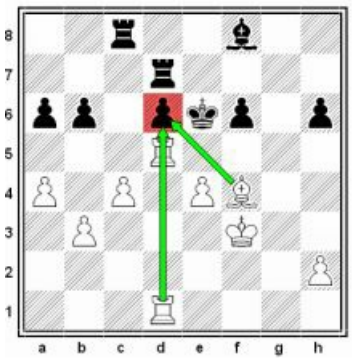


White counts on a permanent advantage. Why is that the case? Because Black does not take it upon itself to free itself, what can they do? Practically, they cannot move without losing material. White could maintain its lead with passive moves, although it will not progress much. This is also one of the keys to identifying the permanent positional advantages.

Let us explain this a little better with a brief analysis of the position:

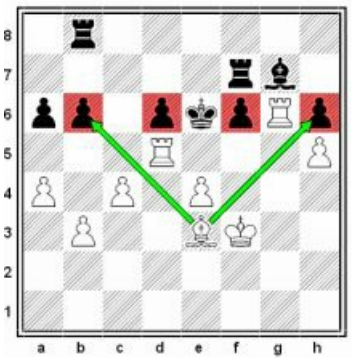
- Black has a major space disadvantage, and this makes the relative value of its pieces lower. The bishop on f8 is enclosed in its pawns and, interestingly, all black pawns except the a6 pawn are on dark squares, which makes life still more uncomfortable for the bishop. These pawns are obstacles for him.
- Besides, Black suffers a major general structural weakness: pawns d, f and h are isolated pawns on dark squares (could be attacked by the black bishop) and also one of them (pawn d) is delayed by a half-open file, which makes it the biggest weakness of the position.
- White is clearly better. I checked out of curiosity the value on a chess engine and it gives an advantage of +1.96; i.e., as if White had two pawns more despite not having any more. However, the weakness of d6 is pressed to the max, so we cannot add more "fuel to the fire" and it is why we must think quickly how to create a second weakness to distract defending enemy forces. The game is very instructive:

Tiviakov, Sergei (2673) - Anand, Viswanathan (2799) [B51]
Bundesliga Germany 04-14-2012



31.h4! [This is the idea. White wants to set the h6 pawn on a dark square (going after h5) and also making available the g6 square for the rook, so that it can press with two pieces on the weak pawn on h6].

31…Rc6 32.h5 Rb7 33.Be3 Rb8 [if 33…b5 34.cxb5 axb5 35.a5!+– and now White also has a passed pawn.] **34.Bd4 Rc7 35.Rg1 Bg7** [35…Rg7 36.Rg6 Rxg6 37.hxg6+–] **36.Rg6 Rf7 37.Be3** [the first part of the plan has been achieved. The rook and bishop punish the same point: the h-pawn, and Black cannot defend].



37…Rd7 38.Rf5 Rf7 39.Kg4 [39.Ke2!?] **39…Bf8 40.Bxh6** [After isolating it, it is rounded off with weakness. Another important positional principle: before attacking a weakness, it is necessary to isolate] **40…Bxh6 41.Rxh6 Rg7+ 42.Kf4 Rf8** [Now, White has changed the initial pressure on the d6 pawn by a new weakness: the h5 passed pawn. And it is creating a new second weakness, applying the principles we are seeing].

43.a5! [Very good move, weakening the queenside and threatening to create a second passed

pawn. Passed pawns are a great force in any endgame] [43.e5 dxe5+ 44.Rxe5+ Kf7 45.Rf5 Ke6 46.a5 Rg1 47.Re5++–].

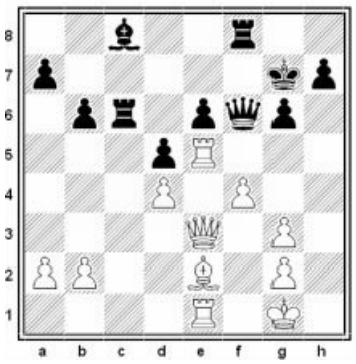
43…Rg1 [43…bxa5 44.e5 dxe5+ 45.Rxe5+ Kd6 *(45…Kf7 46.Rf5 Kg8 47.Rfxf6 Rxf6+ 48.Rxf6 a4 49.bxa4 Rc7 50.Rxa6 Rxc4+ 51.Kg5+–)* 46.Rxa5+–] **44.axb6 Rb1** [44…Rf1+ is not served by: 45.Kg4 Rg8+ 46.Rg6 Rxg6+ 47.hxg6 Rg1+ 48.Kf4 Rxg6 49.Rd5+– is a desperate position for Black. It threatens b4 and c5, creating two linked and passed pawns. 49…Rg7].

45.b7 Rxb3 46.e5 dxe5+ 47.Rxe5+ Kd6 [47…Kf7 48.Rh7+ Kg8 49.Ree7+–] **48.Rf5 Ke6** [48…Rxb7 49.Rhxf6+ Rxf6 50.Rxf6+ Ke7 51.Rxa6 Rc7 52.Ra4] **9.Rh7 Rd8 50.Rd5 1–0**

As you can see, White has followed perfectly the principles I propose. First, it has been determined that it has a permanent advantage, then it pressed on the weaker and finally created a second weakness (since the former by itself, in this case, was not enough to win) to make Black's position implode.

This pattern occurs hundreds or thousands of times in games at all levels. And simply by detecting it, you can play this type of position with great rigor and, above all, much more effectiveness. Let's see a bit more complex new example:

White to move. Take a few minutes to analyze and familiarize yourself with it.



Although at first glance it's hard to believe, we are actually at the "same position" as in the previous game between Anand and Tiviakov. That is, it is the same pattern and the method of game play follows exactly the same principles. Let me tell you what is happening on the board:

- Material balance exists, but the rest of the positional assessment leads us to conclude that there are significant positional imbalances.
- Elements in favor of White:
    1) It has the space advantage
    2) Greater central control.
    3) The white pieces are better because they dominate the most important

lines (file e, d2-a6 diagonal and d2-h5), are better coordinated and not hindered with the structure of their own pawns, as is the case with the bishop on c8.

4) Black contends with weakness amounting to three times the pressure on e6 (would be equivalent to pawn d6 of the previous game).

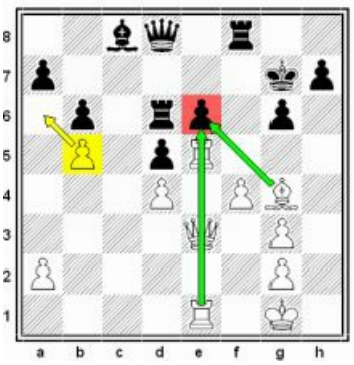
As you can see, White already has "all the wood on the fire" of the weakness of e6, but with this weakness alone it is not possible to win the game. It needs to create another.

Morozevich, Alexander (2595) - Petrushin, Alexander I (2415) [B50]

RUS-Cup6 Krasnodar (1), 1997

33.b4! [White tries to create a second weakness: the backward a7 pawn] **33…Qd8 34.b5 Rd6?** [This move loses directly. Rc2 was better, although Black's position is already very constrained and difficult] [34…Rc2 35.Bg4 Rf6 36.Bxe6 Bxe6 37.Rxe6 Rxe6 38.Qxe6 Rxa2 39.Rc1+–].

35.Bg4 surprisingly resembles the position in strategic terms from the previous game.



Rf6 36.Qa3!+– Rf7 [36…Qc7?? 37.Rc1 Qd7 38.Rxc8 Qxc8 39.Qxd6; 36…Qe7 37.Rxd5!; 36…Qd7 is the only move that does not lose material, but after 37.R5e3 White can double its rooks on the c file and the strategy is simply devastating].

37.Bxe6 [At last the main weakness falls] **37…Bxe6 38.Rxe6 Rxe6 39.Rxe6 Qd7 40.Qe3** [now White not only has an extra pawn, but his king is in a situation of greater security than the Black king and, as you know, king safety is the most important factor].

40…Qxb5 41.Qe5+ Kh6 42.g4 1–0

THE TEMPORARY ADVANTAGE

If with the permanent advantage you found yourself comfortable because your opponent was

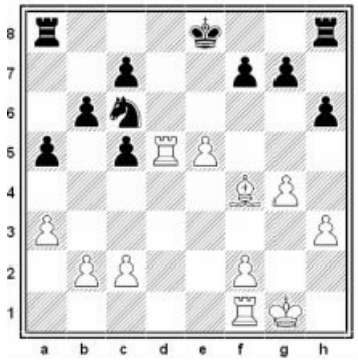
passive, with the temporary advantage it is not going to happen. Your advantage will be fleeting, and it might be that your opponent can take advantage of the fact that you are counting on certain weaknesses. The biggest difference in respect to the permanent advantage is that if you do not play with great precision you can lose it with relative ease. The temporary advantage is when there are destabilizing factors related to the dynamism of the position and to the initiative.

This type of position you should play bearing in mind all the above. So you will need an energetic game and speed to reach the weaknesses of your opponent. I'll show you a couple of examples, but you can deepen your understanding by looking at games of combative players like Kasparov, Shirov, Topalov or Nakamura.

As you see, each type of advantage is played differently, so we must pay close attention to the nature of the position. Before deciding what to play, after diagnosing an advantage that we have, we must try to be clear about the nature of our advantage.

Consider the following example:

White to move. Take a few minutes to analyze the position and decide on a plan.

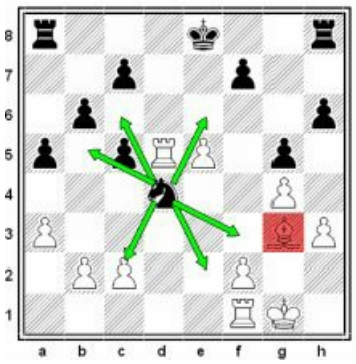


Is not easy to realize what the little White advantage consists of in this endgame of rooks and minor pieces. Consider the position:

- Material balance exists.
- The White king is in a safe position, because though it has advanced kingside pawns, it cannot be reached. Instead, the Black king is in the center of the board, an objectively unsafe situation but, as with the White king, there are not enough pieces that can attack him.
- There are pawns on both sides of the board, so if the bishop finds space and good diagonals it may be able to display superiority over the knight.
- Black counts on a major weakness: the c7 double pawn that is not protected.
- The white rook on d5 is more active and somewhat better than its counterpart on a8. The same applies to the rook on f1 with respect to h8.

As we see, the most important strategic factor lies in the fight of the bishop against the knight. The remaining elements exist, but they do not have enough weight to base our game on them.

But before proceeding with the right move, consider the following sequence. Suppose White moves **20.Rfd1,** a natural move, so the game could follow: **g5 21.Bg3 Nd4.** We arrive at this position:

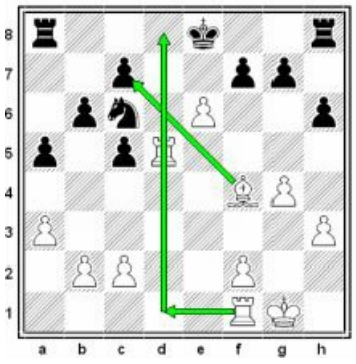


What has happened? Black has improved the position of its knight and has worsened that of the bishop that now has less mobility and collides with its e5 pawn. This is really the underlying small positional threat. White must prevent the relative value of the knight from being superior to the bishop; this was the way Shirov played:

(1) Shirov, Alexei (2726) - Sokolov, Ivan (2624) [C67]

Sarajevo (Bosnia) 29th Sarajevo (8), 05-25-1999

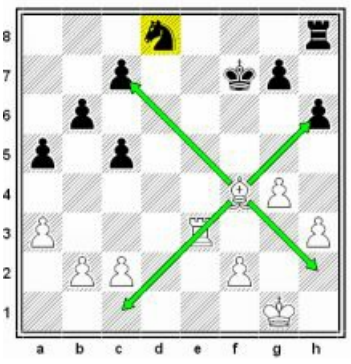
20.e6! ± [Great move. White correctly interprets the position. If it does not act energetically, the temporary advantage will disappear as we have seen in the analysis of the previous sequence.



20… fxe6 21.Re1 Rd8 [Now Black also could have played Nd4 as in the previous sequence,

but the difference is that now the bishop's mobility encounters no limitations and there are weak black pawns (e and c are available), for example: 21…Nd4 22.Kg2 c6 23.Rd6 Rf8 *(23…Nxc2 24.Rdxe6+ Kf7 25.Re7+ Kf8 26.R1e4±; 23…Rd8 24.Rxd8+ Kxd8 25.c3+–)* 24.Bg3! (24.Be5 Nxc2 *(24…Ke7? 25.Rd1!)* 25.Re4 Nd4 26.Bxd4 *(26.Bxg7 Ke7)* 26…cxd4 27.Rxc6 Rd8!) 24… Ke7 25.Rd1! *(25.c3 e5! 26.Bxe5 Nf3 27.Re3 Nxe5 28.Rd2 Kf6 29.Rd6+ Ke7=)* 25…Rfd8 26.Rxd8 Rxd8 27.Bc7 Rd5 28.Bxb6! *(28.c4!? Rd7 29.Bxb6 Nb3 30.Rxd7+ Kxd7 31.a4!±)* 28… Nxc2 29.Rc1 Nd4 30.Rxc5±].

22.Rxe6+ Kf7 23.Rxd8 Nxd8 24.Re3!! [And now White is better. The bishop is superior to the knight in the open position and has a structure of more flexible pawns: on the kingside White has the option to move three pawns against two, while Black cannot say the same on the queenside despite the numerical superiority due to having doubled "c" pawns].

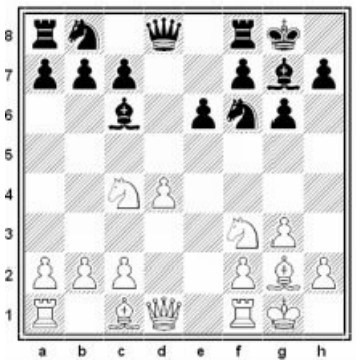


24… Ne6 25.Be5! [The e5 bishop dominates all of the position].

Finally, after a final dispute, White won. But whatever the outcome, what interests us is realizing the value of opportunity. Perhaps the advantage is very small, in this case: the difference in the relative value between the bishop and knight, but **showing sensitivity to the temporal advantages when the advantage may be lost and deploying a strong game against the opponent's weaknesses, is critical to take advantage of these positions**.

Here is a new interpretation of the concept of hands from Harikrishna, a great Indian player.

Black to play. Take a few minutes to analyze the following and familiarize yourself with it.



Bartel Mateusz (2638) - Harikrishna, P (2709) [C10]

Bundesliga, 2013

The position shows a situation where White seems to have an interesting positional advantage. The central control is large and the d4 pawn provides White with a definite space advantage. This can be a key factor in the game. The black knight seems to be developed by d7, but then the queen and black rook would be without great possibilities to connect and be activated. The White center (supported by the d4 pawn) appears strong and neither c5 nor e5 are yet threatening to destroy it. The first player can improve his position easily (Re1, Ne5, c3, Bf4…). How can Black react to that? Harikrishna begins to show, in a brilliant manner, that the energetic or dynamic game can be a good option to fight the static advantage of White].

10...Bb5!? [A very active idea. The bishop gives way to other black pieces and also seeks the exchange of material (important concept when we have little space). The c7 pawn already has the option to advance, but also the b8 knight has extra options (such as Nc6). Harikrishna understands well the importance of replacing the pieces and arranging them according to the demands of the position] [10...Nbd7 would be a natural idea, controlling the jump to e5 and preparing the c5 rupture for the future. White would maintain a slight advantage 11.Qe2 b6 12.Bf4].

11.Nfe5 [Natural move and one that seems powerful in order to take advantage of the black bishop no longer fighting for the diagonal. But Black has recourse.] [11.b3 c5 was probably the Black idea to react against the Black center and fight for the long diagonal a1–h8 12.a4 Bxc4 13.bxc4 Nc6].

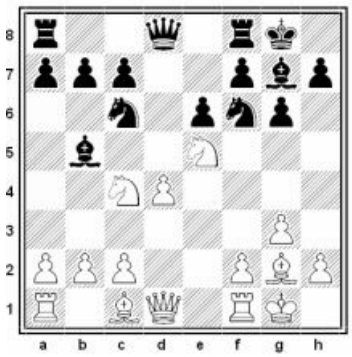
11…Nc6? [Great chess concept. Black severely weakens its structure, but understands the favorable known factors.

1) Fighting the strong g2 bishop.

2) Exchanging pieces and thus relieving the lack of space.

3) Opening lines (such as a1-h8 diagonal or file "b" or "d" with Qd5) will be good for counterplay. Positionally, it leaves a weakened structure, but is intended to compensate with

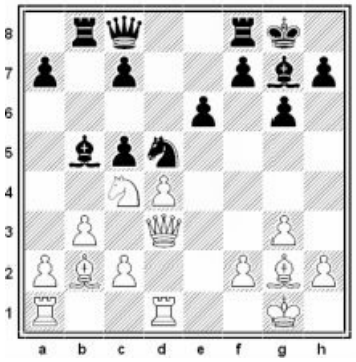
active play and strong reactions].



[11...Nd5 was another candidate for fighting against the white bishop. Black attacks both knights and prepares the ideas f6 or Nd7 12.Re1 f6 *(12…Nd7?* fails 13.Nxd7 *Qxd7 14.Ne5* the c4 threat forces the capture *14…Bxe5 15.dxe5* the situation has been clarified and the exchanges show a White advantage. The weakness of the dark castling squares are easy to take advantage of with Bh6, and also the White center is strong and can prepare the advance b3-c4 to fight for file "d" 13.Na3 fxe5 14.Nxb5 c6 and with tactical details Black's game is acceptable].

12.Nxc6 bxc6! [A logical decision, but one that needs calculation. Why? The pin of Nc4 seems to force White into a passive defense. However, the Ne5 jump must be taken into account] [12...Bxc6 was logical 13.Bxc6 bxc6 and with Qd5 the possible c5, Black has an active game].

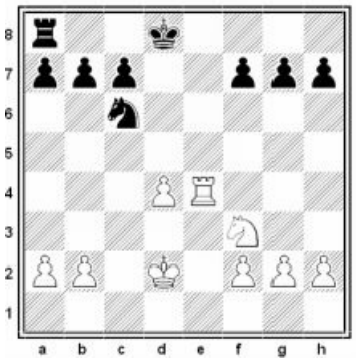
13.b3 Nd5! [Significant Black activity continues to compensate for the structure. The dark diagonal has been weakened and c5 rupture comes very fast, intending to take advantage of it] **14.Bb2 Rb8 15.Qd3 c5** [and after the final rupture, the Black plan is concluded. All pieces are active and it is free of the double pawns, being able to fight for an advantage] **16.Rfd1** [16.Rad1 is more natural, keeping the other rook for control of central files] **16...Nb4!? 17.Qc3! Nd5** [17…Bxd4 seems possible but very dangerous: it is necessary to consider the White attack after eliminating the *fianchetto* bishop 18.Rxd4 Qxd4 *(18…cxd4 19.Qxb4)* 19.Qf3 Qd8 avoiding Qf6 20.Rd1 Qg5 21.h4 Qf5 22.Qc3 f6 23.Ne3 Qh5 24.Bh3 Rbe8 25.Ng4] **18.Qd3 Qc8!?** [Black rejects the draw and seeks with this move to better coordinate the pieces. The bishop can be improved with Ba6-b7 and can also prepare Qa6].



19.a4 Ba6 20.Bf1 [Too passive] **20…Nb4 21.Qe4 Bb7** [21…f5 was also strong 22.Qe2 Nc6] **22.Qe2 Qd7 23.c3 Qd5** [the initial plan of Black has been victorious. The g2 bishop now cannot fight the attack on the long light diagonal] **24.f3 Nc6 25.Ne3?** [Losing material without compensation] [25.dxc5 Qxc5+ 26.Qf2 was more solid] **25… Qxb3** [the active and dynamic Black play finished with material gained and a very passive position for the white pieces] **26.Ra3 Qb6 27.a5 Nxa5 28.Ba1 cxd4 29.cxd4 Nc6 30.Nc4 Ba6 31.Qe3 Bxc4 32.Bxc4 Nb4 33.Qf2 Rfd8 34.Kg2 a5 35.Bc3 Qc6 36.Bf1 Bf8 37.Be1 Nc2 38.Ra2 Nxe1+ 39.Qxe1 a4 40.Rc1 Qd7 0–1**

Finally, I want to show you an example in which consecutively temporary and permanent advantages are given. It will serve to help you understand the **difference between permanent and temporary** advantage. It is a well-known game of Alekhine against Marshall:

White to move. Take a few minutes to analyze and familiarize yourself with it.



White has a temporary **advantage** that will be converted into a permanent one of **material**. The temporary advantage arises from the bad situation of Ra8, which is outside the game. This rook would need at minimum two moves to enter the action (Kd7 and Re8, for example). This difference of initiative, that is to say, that it is White that "rules the roost" is what leads us to

conclude that White is better. But we know that the time advantage is lost very quickly, so White decided to make it a permanent advantage, in this case material. Notice how the game went:

Alekhine, Alexander - Marshall, Frank James [C42]

St Petersburg, St Petersburg Preliminary (4), 04/26/1914

19.Rg4! [Very good move. The g6 move that will be needed is raised so that Black cannot defend his pawn structure on the kingside] **19...g6 20.Rh4** [and now the h7 pawn has no salvation.] **20…Ke7** [20…h5 21.g4 Black cannot take the pawn on g4 because it loses its rook Rh8, which loses the pawn **21.Rxh7** [and now White has a permanent material advantage. Here's the rest of the game if you want to see how it ended:

21…Rd8 22.Rh4 Rd5 23.Re4+ Kf8 24.Kc3 Rf5 25.Re2 a6 26.a3 Ne7 27.Re5 Rf6 28.Kd3 b6 29.Re2 Nd5 30.Ke4 Nf4 31.Rc2 Nxg2 32.Ne5 Ke8 33.Rxc7 Rxf2 34.Nc4 b5 35.Nd6+ Kf8 36.d5 f6 37.Nb7 Nf4 38.b4 g5 39.d6 Ne6 40.Kd5 Nf4+ 41.Kc6 Rxh2 42.Nc5 Rd2 43.Rc8+ Kf7 44.d7 Ne6 45.Nxe6 Kxe6 46.d8Q Rxd8 47.Rxd8 g4 48.Re8+ Kf7 49.Re2 f5 50.Kd5 Kf6 51.Kd4 f4 52.Ke4 Kg5 53.Rc2 f3 54.Rd2 Kh4 55.Kf4 Kh3 1-0

IV. Critical positions and critical moments

The chess game begins in an equal position, complete stability. The only difference is that White moves first and, therefore, the difference is a temporary factor, internal time of the game (no time on the clock as it has not yet been implemented). No other imbalance. This is why it is very simple to evaluate this game position. Since the pieces are located on identical and symmetrical squares, they have not produced any captures and no piece has moved, we can say that White has a slight advantage for the simple fact of beginning the movement, the power of striking first. Machines evaluate this position as an advantage of approximately +0.24 for White (keep in mind that the reference value is 1, +1 means that you win a pawn, but this value can also be weighted according to other factors).

After the first move, we enter the opening phase; the norm in the chess club and in professional chess is that both sides develop their pieces without any captures. Each of the players will focus on redistributing its pieces and establishing a favorable pawn structure. All this takes place in apparent calm, but **middle game approaches: the horror of every player**.

As both players go about ensuring control and domination of different squares, each one will find that increasingly they have fewer choices, fewer "safe" places to deploy their troops into the moves that follow. Everything moves inevitably toward conflict.

Well, at this point and at this stage, there will be a "turning point" where your next move or that of your opponent will lead to some sort of advantage over the other: the control of a weak

square, the appearance of weakness in the pawn structure...

No matter how small or big this advantage is, the player who makes the wrong choice, that makes one false move, ends up with some kind of disadvantage that can be so important as to justify losing the game in the end. This "turning point" is known as the "**critical position**."

Omitting this moment in the game can generate consequences of enormous significance. Because, in fact, usually not more than two or three times in the game do these present themselves and, as such, they represent opportunities to obtain the advantage. Spassky said that, for Fischer, this was his only weakness; perhaps it goes without saying, but this story may heighten our awareness of the enormous difficulty that exists in that moment when, first, detecting these critical moments, and second, when using them.

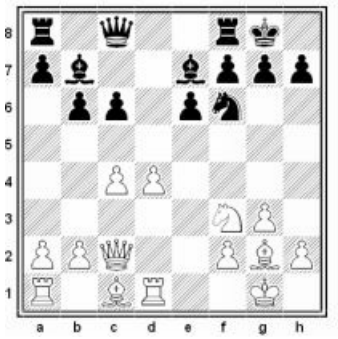
Some keys to detect critical moments:

- **Learn to be sensitive to changes.** Whether you're Magnus Carlsen or the worst player in your club, after every move the game transforms. Every move implies a difference in respect to that which existed previously. For example, if you move with Black, already on the first move there is a complete difference between a move against 1.e4, which will lead to open or half-open positions, versus against 1.d4 that, on the contrary, providing closed or semi-closed positions.
- **There appear to be no obvious moves.** Like in the opening, everything flows with relative ease, at a critical moment everything seems "stuck" a little and it is not easy to make a decision. Of course, the best players usually have a fully trained "sense of smell" and, as you would imagine, handle them with greater ease.
- Sometimes, a critical position is preceded by the **threat of counterplay** by your opponent.
- It is almost impossible to recognize a **critical position** if you do not understand what your opponent wants to do.
- If you do not understand that a position is critical and you do not invest time in it, then you will miss the opportunity to **obtain an advantage or to equalize the game.** Therefore, it becomes extremely important to understand what a critical position is and how to identify it.
- **The theory has ended**. That is to say, it has not been studied beyond the resulting position and players must start improvising.
- They must decide **to change the nature of the position**, for example, exchanging queens in an endgame, establishing another type of center...

Consider a first example, relatively simple. It is Kasparov playing simultaneously against a very respectable player of over 2250 ELO points. I recommend that you spend 10 or 15 minutes

to analyze the position before continuing on the next page:

How would you play with White?



The opening has apparently come to an end. White just needs to develop the bishop at c1, but we can interpret that this phase has terminated since, without moving, the bishop at c1 is already playing to control its diagonal.

The first thing is to understand why this position is so important. Most of the time that you're playing you have to interpret and "divine" what your opponent wants to do. While playing White, think here as if it were Black's turn. What do you believe it would like to move?

Of course, if you were Black and you were called upon to play, you would love to do c5 to give your b7 bishop air, as it is the only missing piece because it really interferes in the game. Once you get to this point where the opening ends and you realize what your opponent wants to do, you also realize why the situation is so critical.

If you do not think this way, you would end up playing with White Bf4, making a move of natural development, then Black would play c5! and the position is equalized. That is to say, **you could not take advantage of the critical position**.

If you thought properly, you would end up playing like did Kasparov did, i.e. c5! holding the freeing c5 move of Black and preventing the development of the bishop at b7. It is a very typical positional idea to keep a bishop of your opponent passive and "play against a bishop"; i.e. strategically focusing on that factor and exploiting almost as if it were the most important thing in the world.

Here you can see how the game developed:

Kasparov, Garry (2805) - Dubiel, Jacek (2275) [E09]

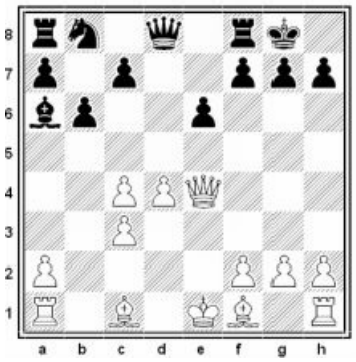
Sim Katowice, 1993

1.d4 d5 2.c4 e6 3.Nf3 Nf6 4.g3 Be7 5.Bg2 0–0 6.Qc2 c6 7.0–0 b6 8.Nbd2 Bb7 9.e4 dxe4 10.Nxe4 Nxe4 11.Qxe4 Nd7 12.Rd1 Qc8 13.Qc2 Nf6 14.c5 Rd8 15.Bf4 Nd5 16.Bg5 f6 17.Bd2 bxc5 18.dxc5 a5 19.Bh3 f5 20.Re1 Bf6 21.Bg5 Ba6 22.Bxf6 Nxf6 23.Ne5 Rd5 24.Bg2 Ne4

25.Bxe4 Rxe5 26.Bf3 Rxe1+ 27.Rxe1 Kf7 28.Qc3 Bb5 29.Qd4 Qd8 30.Qe5 Qf6 31.Qf4 a4 32.Bxc6 Bxc6 33.Qc7+ Qe7 34.Qxc6 Ra7 35.Qb6 Rb7 36.Rxe6 Qd7 37.Rd6 Qe7 38.Qc6 g6 39.Qd5+ Kf8 40.c6 Rc7 41.Rd8+ 1–0

Consider another example, this is a bit more difficult, but the essence is the same. Again, spend 10 or 15 minutes analyzing the position on a real board:

How would you play with Black?



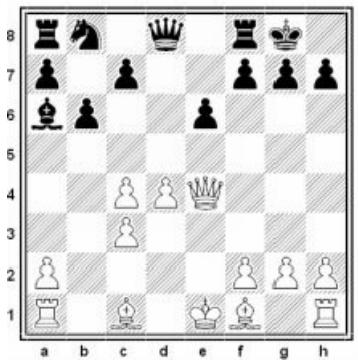
White is threatening the rook at a8 and only two moves remain to complete development, Bd3 and 0-0 probably will be the most appropriate to do.

Black, meanwhile, has already castled and developed its light-squared bishop, but lacks developing Nb8, with which it seems evident that the leading move for consideration is Nd7: developing the last piece and also protecting the rook with the queen. The question is what would happen after Nd7? Will we be able to obtain some type of advantage? Does the opponent threaten to achieve counterplay? Are there alternatives?

Portisch, Lajos - Fischer, Robert James [E45]

Piatigorsky-Cup 2nd Santa Monica (11), 08-03-1966

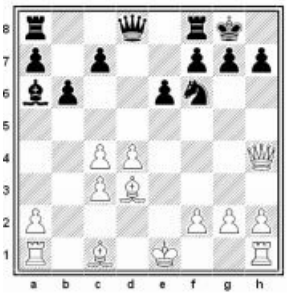
1.d4 Nf6 2.c4 e6 3.Nc3 Bb4 4.e3 b6 5.Nge2 Ba6 6.Ng3 Bxc3+ 7.bxc3 d5 8.Qf3 0–0 9.e4 dxe4 10.Nxe4 Nxe4 11.Qxe4



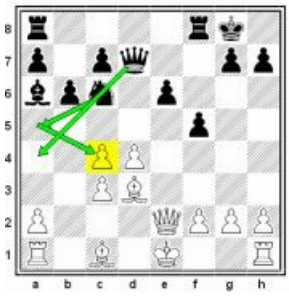
11…Qd7! [If 11…Nd7 12.Bd3 Nf6 13.Qh4 And now? White has seized the initiative, and what is worse for Black: it does not have a clear plan of game nor strategic objectives on which to develop a plan. The only option would be to play against the doubled c4 pawn, since it is done typically in these positions, but the black knight should not be on f6; it should be on a5, and arriving at that square (a5) is supposed to solve two problems: to solve the pressure on the h7 point and to spend four moves with the knight (Nd7-b8-c6-a5). Crazy and a burden] [If 12.Qxa8 Nc6 13.Qxf8+ Kxf8 and Black has the advantage by the presence of the queen against the two rooks in the middle game, and by the weakness of the White structure of the queenside].

12.Ba3? [This move does not improve the position of the white pieces nor constitute an improvement in the speed of development] [12.Bd3 This would be the natural and agreed move, more with the characteristics of the position. 12… f5 13.Qe2 Nc6 and now Black is not encountering the pressure on h7 and can play against the c4 pawn, the knight can proceed to a5 and the queen to a4. It is interesting to compare this position with the resultant of the sequence 11…Nd7 that we explained previously. In that one, Black is much more passive and without clear game plans, observe it on the right].

Final position line with 12.Bd3



Final position line with 11...Nd7



12…Re8 13.Bd3 f5 14.Qxa8 Nc6 15.Qxe8+ Qxe8 16.0–0 Na5 17.Rae1 Bxc4?! [Fischer

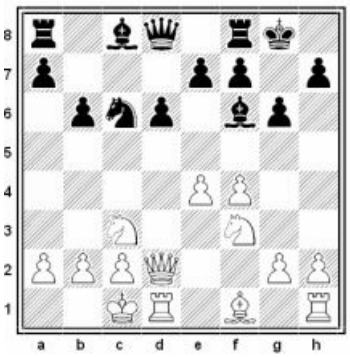
opts for the most obvious way, contrary to the move Qd7. Qa4 was much stronger. Let's see it: 17…Qa4! 18.Bb4 Bxc4 19.Bxc4 Nxc4 20.Rxe6 a5 21.Be7 Nd2 22.Rfe1 Ne4 23.Bh4 h6 and Black should win, since his king is safe, the bishop and the white rooks are uncoordinated and there are too many weaknesses in the White territory: the pawn of a2, the c3 and d4 hanging pawns, and the first rank.]

18.Bxc4 Nxc4 19.Bc1 c5 20.dxc5 bxc5 21.Bf4 h6 22.Re2 g5 23.Be5 Qd8 24.Rfe1 Kf7 25.h3 f4 26.Kh2 a6 27.Re4 Qd5 28.h4 Ne3 29.R1xe3 fxe3 30.Rxe3 Qxa2 31.Rf3+ Ke8 32.Bg7 Qc4 33.hxg5 hxg5 34.Rf8+ Kd7 35.Ra8 Kc6 0–1

In the first example as in the second, Kasparov and Fischer stop, before making “natural” Bb4 and Nd7 moves respectively. These moves have been concluded the developments from a theoretical point of view, and we cannot say that they are errors, but there are small positional inaccuracies that allow the opportunity to fight for the advantage.

This is another important aspect of critical positions according to this concept: when we do not resolve them correctly, we do not necessarily make a mistake. It is the difference between what I call "**critical moments**"; i.e., those moments of the game in one way or the other you need to hit with a move, or the consequences are completely harmful. This kind of position we will see later, but before, we finish up this point with an item that I definitely think will help you understand the concept and be able to put it into practice. It is a great game played by Judit Polgar in the 2000 Istanbul Olympics against Grandmaster Soviet-Israeli Iliá Smirin.

How would you play with White? Think about it... without seeing the solution!



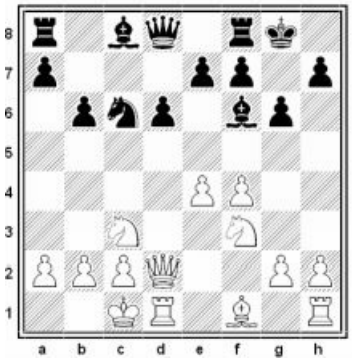
Polgar, Judit (2656) - Smirin, Ilia (2677) [B09]

34th Istanbul Ol. (Men), 11-05-2000

1.e4 g6 2.d4 Bg7 3.Nc3 d6 4.f4 Nf6 5.Nf3 0–0 6.Be3 b6 7.Qd2 c5 8.0–0–0 cxd4 9.Bxd4 Nc6 10.Bxf6 Bxf6

[We have reached a critical position. Probably anticipating a move by the Hungarian grandmaster. We can consider that White has completed its development (it has led its knights to

the fight, has castled and the light-squared bishop is already playing without moving). [Black is in a similar situation, but it is White to move].



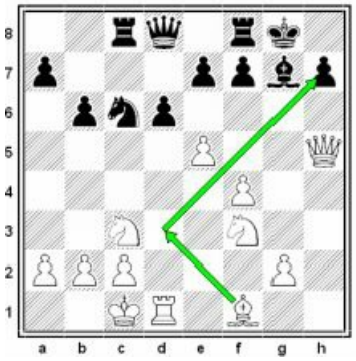
11.h4! [Shocking move, especially if we take into account the "logical" response of Black: the developing move 12…Bg4 which, moreover, seems that it impedes the expected advance 13.h5].

[11.e5? dxe5 12.Qxd8 Rxd8 13.Rxd8+ Nxd8 14.fxe5 Bg7 15.Nd5 Bb7 with Black advantage. [Gomez Jurado, L - Efimov, I/Andorra op 1993].

If you look closely, it is something akin to what we saw in the previous examples. It's another opening, other players, another position, but the important thing is that the essence is the same. White is anticipating, in a very complex way, the intentions of Black. In the example of Kasparov, the clear positional threat was c5; in this example the Black "threat" (a mini-threat) finishing its development with Bg4 or, perhaps, with Bb7.

11…Bg4 12.h5! (this was the intended answer to Bg4) **Bxh5** [12…Nb4?! 13.hxg6 hxg6 14.Bc4 Rc8 15.Bb3±] **13.Rxh5! gxh5 14.Qd5 Rc8 15.Qxh5 Bg7** [15…Bxc3? 16.Ng5!+–; 15…Nb4 16.e5 Bg7 17.a3 Rxc3 18.bxc3 Na2+ 19.Kb2 Nxc3 20.Kxc3 and White is one piece up].

16.e5!



...Qe8 17.Qh3! [Why the admiration? Qh3 is a move of great positional understanding and it is not easy to see it. The white pieces will come to attack in the following way: the knight by g5, the bishop by c4 and the queen by f5 to hit on the weakest point of the castling: the h7 pawn, which is only defended by the king. [From h5, the queen is already pointed to h7, but after the Black h6 defense (imagining that the knight was on g5), it is not possible to continue the attack].

17…h6 [17…dxe5 18.Ng5! h6 19.Qf5! In this line what was previously explained can be appreciated. The queen on f5 aims for h7, but now offers a free path through the diagonal b1-h7, without pawns interfering, and can be supported by the bishop from d3. 19…hxg5 20.Bd3 f6 21.Qh7+ Kf7 22.Bg6+ Ke6 23.f5#].

18.Bd3 Nb4 19.Be4 e6 [Trying to prevent the queen from being situated on the critical square f5.]

[19…d5 20.Nxd5 Nxd5 21.Qf5+– and checkmate in a few moves] **20.f5! Rxc3** [defensive suicide but the only option] [20…dxe5 21.f6 Bxf6 22.Qxh6+–] **21.f6!** [21.bxc3?! Nxa2+ 22.Kb2 Nxc3 23.Kxc3 Qa4 and Black can ensnare] **21…Qb5 22.Qg3!** [22.Qg3 Rxc2+ 23.Bxc2 Nxa2+ 24.Kd2 Qb4+ 25.Ke2 Qb5+ *(25…Qc4+ 26.Ke1 Qb4+ 27.Rd2+–)* 26.Kf2 Qc5+ 27.Kf1+–]. **1-0**

As you can see, detecting critical positions is of great help to winning the advantage.

CRITICAL MOMENTS

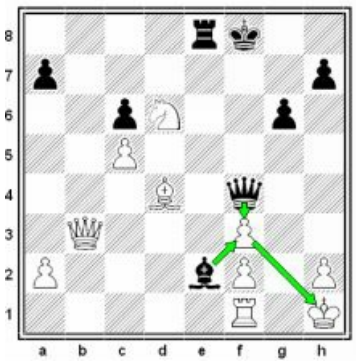
While critical positions carry the possibility of not playing with precision and not remaining in an inferior position because of it, in a critical moment it does not happen the same way; i.e., if we do not carry out the precise move, we remain clearly inferior. This is the fundamental difference.

What characterizes critical positions?

- It is frequent that they arise in **very complex positions**.
- They do not usually occur in the **opening**.
- By the same reasoning we can say that the **more complex** a position is, **the more likely** that **critical moments** exist.
- They are much more **frequent in tactical positions** than in strategic positions.
- Its resolution usually involves a **greater capacity of calculation and tactical vision** than critical positions, in which the strategic vision usually is predominant.
- The solution to a tactically critical position almost always comes from the hand of an **active player**.

Let's look at some examples:

How would you play with White?



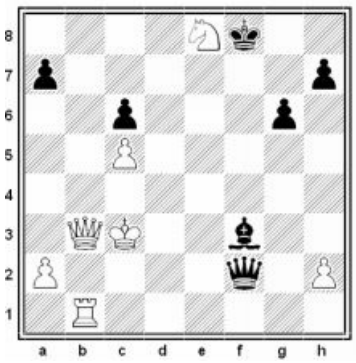
In this position already we can perceive that some things are different from the previous positions. Why? Because very serious threats for both sides exist, a very high percentage of pieces is threatening other pieces (focus on the rooks, the e4 bishop, the point f3…). The kings are very exposed. In fact, the White king is at the point of being victim of a checkmate with the Black maneuver Bxf3-Qg4 and Qg2. White only has one possible move in this position.

Mikhalevski, Victor (2516) - Odendahl, Reiner (2332) [A42]

Dieren op Dieren (3), 07-22-1999

31.Bg7+! [Victor Mikhalevski himself said after the game: "I was very lucky when finding this idea at this critical moment with less than a minute and a half on my clock."] **31…Kxg7 32.Nxe8+ Kf8 33.Rb1!** [Again another critical moment. The rook has left an escape route for the king, but it must be on a square where it can be defended in case it receives a double attack with check on the first rank].

33…Bxf3+ 34.Kg1 Qg4+ 35.Kf1 Qg2+ 36.Ke1 Qg1+ 37.Kd2 Qxf2+ 38.Kc3 [Small imprecision! After this move, the tie is guaranteed for Black if it plays accurately, but it is mistaken] [38.Kc1? Be4! With Black advantage].



38…Qxc5+? [The definitive error. Black was very worried and makes the natural and "logical" move, but that which carries it to the defeat].

[38… Bd5!= was necessary, with continuous check in all the lines:

a) 39.Qc2?? Qxc5+ 40.Kb2 Qxc2+ 41.Kxc2 Be4+;

b) 39.Qb4 Qe3+ 40.Kb2 Qf2+ 41.Kc3 Qe3+=;

c) 39.Qb2 Qxc5+ 40.Kd3 Qc4+ 41.Kd2 Qf4+=;

d) 39.Qa4?! Qe3+ *(39…Qxc5+?! 40.Kd3)* 40.Kb2 Qe5+! 41.Kc1 Qc3+ 42.Qc2 Qxc2+ 43.Kxc2 Be4+ with Black advantage;

e) 39.Qa3 Qe3+ 40.Kb2 *(40.Kb4?? Qe4+)* 40…Qe5+! *(40…Qd2+?? 41.Ka1)*

e1 41.Qc3 Qxh2+ 42.Kc1 *(42.Qc2?? Qxc2+ 43.Kxc2 Be4+)* 42…Qg1+=

e2 41.Kc1 41…Qe1+=

39.Kb2 [Now White wins:] **39…Qf2+** [or 39…Bd5 40.Qa3 Qxa3+ 41.Kxa3 Kxe8 42.Rb7+–] **40.Ka3+– Kxe8** [40…Bd5 41.Rb2! Qc5+ *(41…Qf1 42.Qb4+! …Kxe8 43.Qb8+ Kf7 44.Rb7+ Ke6 45.Qe8+ Kf5 46.Qf8++–)* 42.Qb4 Qxb4+ 43.Rxb4 Kxe8 44.Ra4!+–; 40…Qc5+ 41.Qb4 Qxb4+ 42.Rxb4 Kxe8 43.Ra4!+–].

41.Qe6+ [With forced checkmate] **41…Kf8** [41…Kd8 42.Qd6+ Ke8 43.Rb8+ Kf7 44.Rb7+] **42.Qf6+ Ke8 43.Rb8+ Kd7 44.Rd8+ Kc7 45.Qd6+** [Black resigns at the sight of: 45.Qd6+ Kb7 46.Rb8+ Ka6 47.Qd3+ Ka5 48.Qc3+ Ka6 49.Qc4+ Ka5 50.Qa4#]. **1-0**

c. The endgames: powerful tools to play them without fear

I. Both types of endgame

To many people the ending is boring; others avoid, at all costs, arriving at an ending of a game. Others even consider arriving at the end to be a sign of failure and others, perhaps many, think that it does make sense to study endgames if they are never going to arrive… The reality is that players do not lack reasons for which to demote endgames.

But, in this book, I want to give you some arguments of an eminently practical nature, so that you reconsider its importance and you begin to incorporate them in your preparation in an ordered way. That yes, before I set out to clarify that in this defense of the endgame I will not go to the extreme of turning myself into the endgame's "defense attorney."

I consider the endgames to have a moderate importance and that, in the preparation of all the players; they should have the same weight. In addition, I also consider that not all the endgames hold the same value. In fact, in the endgame, the Pareto Principle (discussed earlier in the book) is made very clear: there are some theoretical endings that practically do not occur in practice and just generate synergies with other endgames or with the middle game. For this reason, they should not be the center focus according to The Zugzwang Method. The objective of The Zugzwang Method is that you reach the greater performance while investing the least resources and, once this general mission is reached, you can ask of yourself to invest many more resources to achieve lasting performance.

Why should you study endgames?

"*In order to improve your game, you must study the endgame before everything else. For whereas the endings can be studied and mastered by themselves, the middle game and opening must be studied in relation to the endgame.*" (J. R. Capablanca).

a) The knowledge of endgames is key to be able to do good **positional and strategic interpretation of the middle game**. On many occasions, the middle game contains its own elements of theoretical endgames, and if we know how to handle these endgames, we will be able to orient the middle game so that it is favorable toward the transition into the endgame.

b) Good knowledge of endgames allows the **middle game**:

- To carry out transitions to the endgame in order to impose a material advantage in a successful way.
- To create a transition to the endgame with defensive aims (one of the weapons that we as humans still have in a battle against machines).
- To force an endgame with the objective of shaping a positional advantage.

c) Some decisions in the **middle game** cannot be perceived correctly without knowledge of the endgame.

d) In the endgame, no risk itself exists that is not in the middle game; for that reason the players with more knowledge do not have disadvantages, in leading their inferior opponent toward the endgame, in which they will be able to commit fewer errors and their strategic knowledge will prevail with greater ease.

e) The best players of the world are mistaken about endgames. **The endgame is the last opportunity** to be victorious and is plagued with subtleties.

f) Most players play the whole game aggressively, but the approach that we must use in the end is, to a great extent, different from the one in the middle game, in which time (the time of the game not the one of the clock) is a very important factor, sometimes even determinant.

But in the endgame the opposite almost always happens: slow patience and maneuvers are fundamental. This shift of paradigm, to understand and internalize it, will also contribute great added value to your game.

g) **Modern chess** is outpacing progressively the slow **rhythm** of the game. This causes most endgames to be played with little time and poorly. To have good preparation for the endgame contributes toward a competitive advantage to you.

h) Most players have **deficient preparation for endgames** in relation to other areas. Changing this can position you with a competitive advantage with respect to your rivals.

i) The preparation of certain types of endgames (for example, pawn races) increases valid game **competencies** for **other phases of the game**.

j) Knowing endgames gives you a chess education and that is always good for any player.

For all the previous reasons, the endgame must have its space. Its space is neither all the space in the world nor a "nanobyte" of space. The space it receives is based on your level of game and your aspirations. All of this, we will discuss further in the chapter on how to prepare a training plan. Perhaps, at this moment, you want to take a moment to think about all the above…

But before you do it, I want tell you something else. All the endgames of the world we can categorize into two big groups:

- The theoretical endgames.
- The remaining endgames.

I will explain the difference between both to you and it will surprise you: **the theoretical endgame almost never takes place in practice.** They are those to which chess literature has dedicated innumerable pages: queen and king against rook and king, rook and king against two connected pawns, checkmate by the bishop and the knight, knight and king against king and pawn, Philidor, Lucena, Vancura positions… in short, there are many examples.

And on the other hand, are **all the others**; that is to say, those that are produced in your games and that you will not find so easily in books of theoretical endgames.

What does all of the above mean? Are you saying that I don't have to study theoretical endgames? No! What this means is that, as you embark on the journey (since your time and your capacity are limited and we are trying to optimize resources), you must know:

a) Those theoretical endgames that are statistically more related to the endgames of your games. With your games, with all games in general.

b) Those endgames in which it is totally necessary to play well to attack or defend. There are theoretical endgames, for example, the endgame of bishop and two pawns against a bishop of the same color, in which even without precision it is quite easy to win.

c) Most importantly. You have to know the **key to play any type of endgame**, since basic and general strategies exist that are going to help you to play better in any one of your endgames, whether you have studied them specifically or not. All of the above I will speak on in the following chapter. Exciting, right?

II. ENDGAMES THAT YOU MUST KNOW ONE WAY OR THE OTHER: THE PATTERN TO IMPEL YOUR ENDGAMES ENORMOUSLY

As I explained to you in the previous chapter, I suggest that you focus your preparation on knowing some theoretical endgames (not too many), and learning useful strategies for any type of endgame. These “other” endgames, in fact, we can call the immense majority of them “generic.”

These endgames have the peculiarity of which, somehow, they appear more like the endgame “really” is, more so than giving the sensation of contemplating "laboratory positions." These endgames can contain elements of the theoretical endgames; sometimes it will even be essential to know previously a theoretical endgame to win them, but, as explained, it is not the norm. Let's talk about both of types of endgame:

Let us begin with:

a) Theoretical endgames and techniques that you must know one way or the other, listed by priority:

– Inside the **pawn endgame**:

Technique of the square.

The triangulation.

The opposition (diagonal, frontal and at a distance).

Theory of the conjugated squares (Dedicate some time if you know the three previous points well). This theory can be endless.

Endgame of king and pawn against pawn.

– Inside the **rook endgames**:

Lucena Position.

Philidor Position, also known as Third Rank Defense.

– Inside the **bishop endgames**:

Opposite color bishop and rook's pawn against the king. It is one in which on the board there is a rook's pawn and bishop against king, and the rook's pawn is queened on a square that is of the opposing color to that of the bishop.

- In the **queen vs. pawn endgame**:

The approach.

Very many more theoretical endgames exist; so many, in fact, that they could fill all the books that have been written on the subject and very many more. But the follower of The Zugzwang Method, knowing well the previous endgames, will have a very high percentage of the work done. Down the road, when you have already done all the work that there is to do, you

can focus on this or on another subject that is secondary. Let's optimize!

b) The generic or "real endgame."

I call it a real endgame, that which takes place in your games and that often, does not contain the characteristics of the theoretical endgames. They are of a great heterogeneity and, somehow, we can have the impression that it is not possible to use the knowledge from theoretical endings on them. There is a hint of truth in this, but it is not less true that the knowledge of the theoretical endgame, mainly the previous ones, aid you in interpreting certain positions with greater effectiveness. Like in many aspects of life, the key is balance; for that reason I have begun suggesting "some" of the many theoretical endgames that exist. Those that I consider better for you at this point at your level.

However, let's get to the point, how you can play all endgames better? We are going to separate the guidelines into two:

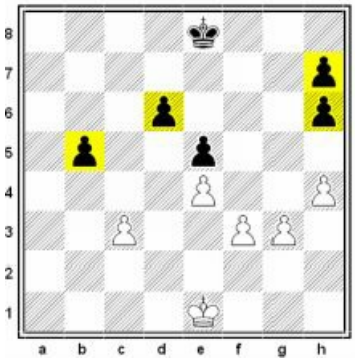
- General guidelines for all endgames.
- General guidelines for all endgames of a certain type.

General guidelines for all endgames.

In 90% of cases, to win the endgame you will have to queen a pawn or to attack the weak pawns of your opponent. For that reason, in the endgame, it is very important to have a good knowledge of the pawn structures and the types of weak pawns. In main lines, the weak pawns are those that cannot be defended by other pawns, and the more advanced they are, the more weak they are. Therefore, an isolated Black pawn on the e4 square (from the perspective of White) is going to be considered weaker than another isolated on the e7 square.

The weak pawns can be (see following diagram):

- Isolated pawns (b5)
- Backward pawns (d6)
- Doubled pawns (h7-h6)
- Hanging pawns. When pawns c and d above all and f are united, but separated from the rest, with which, the advance of one of them debilitates to the other because it turns it into a backwards pawn.

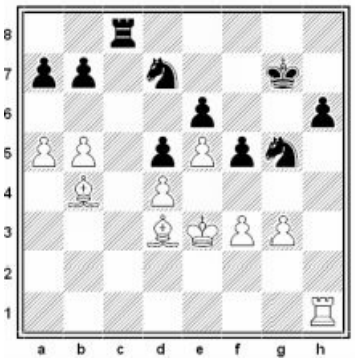


As a general rule, we are going to decide on the strategy of **attacking the weak pawn of our opponent** if we don't have the possibility of using the strategy to support a passed pawn. I reiterate, as in other sections of the book, that chess is plagued with exceptions, but the rules that I reveal in the book will work for you in the immense majority of the cases.

Before attacking them, we will have been in charge of keeping them where they are (avoiding their movement) and, later, capturing them without exchanging them for our pawns (that is to say, to take them for free).

I want to show you a very instructive example of this strategy. An endgame not unlike your own games, but played by a former champion of the world:

White to move. Take a few minutes to analyze and familiarize yourself with it.



Spassky, Boris V (2555) - Cramling, Pia (2545) [C00]

Woman-Veteran London (9), 1996

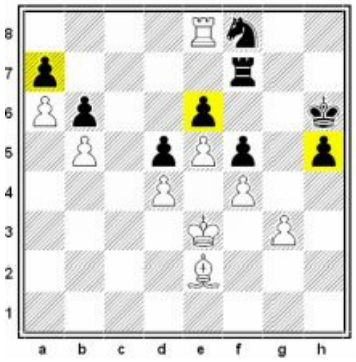
45.Kf4 [White already has in its favor the isolated pawn on h6, that is a weak pawn (it cannot be defended by another pawns). But this pawn is only isolated and is not blocked. Therefore, White is not concentrated on that weakness at this moment and plays Kf4. The idea is to play

46.g4 fxg4 47.Kxg4 and then the advance f3–f4–f5 will insure the pawn “and” that it remains passed].

45…Nf8 46.Bxf8+ Rxf8 [Black is forced to pull its rook back, a move that has as a consequence the abandonment of the file “c”, which will become the front door for the white rook] [46…Kxf8? 47.Rxh6].

47.Rc1 b6 48.a6 [With this move the weakness of the backward a7 pawn remains isolated] **48…Rf7** [avoids the Rc7 move] **49.Ke3 h5** [observe that this pawn has been advanced, so that now it is blocked (by the g3 pawn that prevents its advance) and the fact that it is advanced turns it into a pawn that is the most weak we have seen. The consequences will not be hopeful].

50.Rc8 Nh7 [50…Rf8 51.Rc6+–] **51.f4** [This is the idea. When placing the White structure of pawns on dark squares, the bishop has greater mobility and can attack without problems the (more) weak h5 pawn **51…Nf8 52.Be2 Kh6 53.Re8**, [Again, observe as White constantly follows the strategy to attack the weak pawns: a7, e6 and h5. However, Black encounters subdued passivity. The White advantage is overwhelming].



53…Kg6 54.Kf2! [Very good move! White counts on a **permanent advantage**. It is not in a hurry to carry its king to the h4 square to try to capture the h pawn. As you already know, the strategy in this type of positions is to control mainly the counterplay of the opponent and to subdue it little by little. Without haste]. **54…Kh6 55.Bf3 Kg6 56.Kg2 h4** [Desperation] [56…Kh6 57.Kh3 Zugzwang 57…Kg6 58.Kh4].

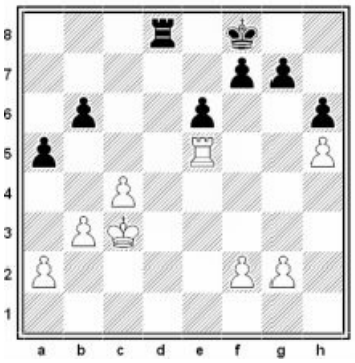
57.gxh4 Kg7 58.h5 [A passed pawn!] **58…Kh6 59.Kh3 Kg7 60.Kh4** [support from the passed pawn].

60…Kh6 61.Bxd5 [A beautiful overkill finish] [61.Bxd5 exd5 62.e6+–]. **1-0**

I could reproduce thousands of endgames in this pattern as applicable. Test yourself by looking at endgames of grandmasters and you will see how this is the major key together with looking for the passed pawn.

Let's home in on the following position.

White to move. Dedicate a few minutes to decide how to play.



Nataf, Igor Alexandre (2559) - Chabanon, Jean Luc (2424) [B19]

Championship of France, 2005

In spite of the equality as far as material, the position shows an interesting White advantage. Based on the advantage are several important factors:

1) The white king and the white rook are active so they can arrive quickly at Black weaknesses (like b6-a5).

2) White's pawn majority on the queenside (three against two) is very useful to create a passed pawn. These pawns increase their potential and in the endgame they are key drivers of the promotion.

3) Black does not have an evident counterattack nor can it easily mobilize its majority of pawns on the kingside. The moment arrives for outlining the plan to demonstrate the advantage in a more and more concrete way].

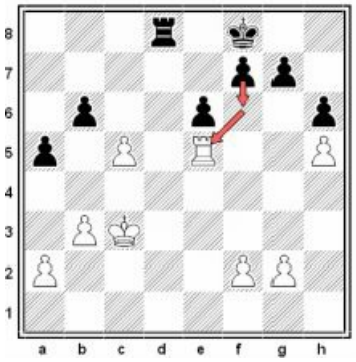
40.c5! [Interesting concept. White does not look to attack the weakness of b6 but based on the idea, it is allowing the entrance of the White king into the queenside. That is to say, White opts on this occasion for the strategy to generate a passed pawn as a strategy with more possibilities of success in this position].

[40.Rb5! was also strong and logical. The rook is transferred to the attack and in addition the c5 rupture is prepared in good conditions. 40…Rd6 *(40…Rb8? 41.c5+–)* 41.c5 a good exchange to not only demonstrate and b6 is weak, but also a5 is 41… Rd5!? *(41…bxc5 42.Rxa5 Rd5 43.a4* mobilizing the passed pawn, important at the endgame. More important than the material is that this pawn can progress 43*…Rxh5 44.Rb5* the pawn of "a" is very strong and it is not easy to restrain it. *44…Rh1 45.Rxc5)* 42.a4! defending the rook and even approaching the possible pawn queening (important rule if a pawn race is produced) 42…bxc5 43.Rxa5 again with the strong passed pawn and the simple plan Rb5-a5-a6].

40…Rc8?! [40… b5 was a tougher defense, intending to block the position, but it follows the White idea to penetrate into the opponent's camp 41.c6! Rc8 42.Rxb5 Rxc6+ 43.Kd3 after the exchange of pawns the position has remained clear. White follows with a “useful majority” two against one on the queenside and in addition the a5 pawn will force Black to remain passive 43…Ra6 and Black has some defense 44.Kc4 looking for the progression Kc5–Rb6 or Rb7–Kb5.

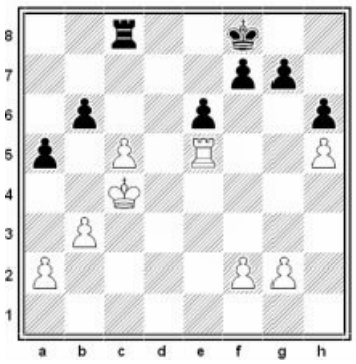
The weakness of a5 condemns Black to a sad endgame, both passive and without great hopes *(44.Rb7* is not so clear because it allows the black rook to activate *44… Rd6+! 45.Ke3 Rd5* with more active defense and good options for salvation*)*].

41.Kc4! [the king continues entering toward the weaknesses of the opponent, but it seems to allow the strong f6 blow. What is the idea then?].



41…f6 [41…Ke7 the alternative, assuming that the f6 move does not work, and activating the king for the defense. Although it is true that perhaps it is insufficient to save the endgame 42.Kb5! bxc5 *(42…f6 43.cxb6* like the game*)* 43.Rxc5 Rd8 44.a4 again the force of the potential of the future passed pawn who will arise after the capture on a5 *(44.Kxa5? Ra8+ 45.Kb6 Rxa2* with good Black counterattack*)* 44…Rb8+ 45.Kc4 Ra8 46.b4 axb4 47.Kxb4 and the passed pawn of “a” is strong and in addition the black rook is passive on a8]

42.Kb5!! [A spectacular solution to the Black attack. The rook is sacrificed to demonstrate that the passed pawn and the active king will surpass the black rook].



42…fxe5 [42…bxc5 43.Rxe6! Rd8 44.Kxa5 the passed pawn of "a" runs very fast again, and the Black king is far from the defense that cannot help. 44…Rd2 *(44…Ra8+ 45.Ra6)* 45.a4 Rxf2 46.Kb5 Rb2 47.Kxc5 Rxb3 48.a5 the material equality does not prevent seeing that the force of the passed pawn of "a" decides the game supported by white pieces 48…Kf7 49.Rc6 Ke7 50.Rc7+].

43.cxb6 [the situation has become clear. The passed pawn will arrive at b7 bound to the black rook. The last step consists of demonstrating that the Black king is neither able to defend nor to obtain suitable counterplay] **43…Ke7 44.b7 Rb8 45.Kc6!** [Strongly played. The king supports his passed pawn, but simultaneously he prevents the defensive function of the opponent's king].

45… e4 [45…Kd8 46.f3+– strongly played, leaving Black in *Zugzwang*, without useful movements. The rook is bound and the black king must contain the entrance on c7 *(46.a3)* 46… Ke7 47.Kc7 Rxb7+ 48.Kxb7 Kd6 49.Kb6 Kd5 50.Kxa5 and the pawn of "b" begins to run].

46.Kc7 Rd8 47.a3!! [Direct 47.b8Q was also winning, but again with the strong move a3 later. By all means it was not in a hurry to promote. 47…Rxb8 48.Kxb8 Kd6 49.a3! strongly played not only avoiding the entrance of the Black king by b4, but also trying to create a passed pawn with b4 at the suitable moment 49…Kc5 50.Kc7 Kd4 51.b4 axb4 52.axb4 now the function of the passed pawn is to move away from the rival king on the key side, the kingside. 52…Kc4 53.Kd6 black pawns now fall one after the other 53…Kxb4 54.Ke5 Kc5 55.Kxe4 Kd6 56.f4 Kd7 57.Ke5 Ke7 58.g3! Kd7 59.g4 Ke7 60.g5 Kf7 *(60…Kd7 61.gxh6 gxh6 62.Kf6* and White achieves the decisive entrance*)* 61.Kd6].

47…e5 [47…Rd7+ 48.Kb6 Rd6+ *(48…Rd8 49.Kxa5 Kd6 50.Kb6!+–* to the passed pawn of "b" is united another powerful one in "a", that will advance without opposition*)* 49.Kxa5 Rd8 50.Kb6+–] **48.b8Q** [now arriving at the same position, but with a3 (a move important to be able to move the pawn soon)].

48…Rxb8 49.Kxb8 Kd6 50.Kb7 Kc5 51.Kc7 [51.Ka6+– was most direct] **51…Kd4** [51… Kd5 52.Kd7] **52.Kd6 Kc3 53.b4 axb4 54.axb4 Kxb4 55.Kxe5** [and Black resigned before the

loss of its kingside pawns. The force of the passed pawns has prevailed in the endgame, even with an important material disadvantage. **1-0**

General guidelines for all endgames of a certain type.

What I will share with you now are general positional motifs for each type of endgame. That is to say, it is a relationship of guidelines that, like in the previous section, will work for you most of the time and are going to help you to support the decisions based on objectives (of the previous section) with specific strategic decisions based on the type of endgame. Please understand me clearly: the decisions of what to play in the endgames are going to be determined by a general strategy (the one of the previous section) combined with specific positional guidelines (those of this section). Let's do this.

Pawn endgame

Endeavor to take the king to the center of the board.

On many occasions, if you arrive in the opponent's camp with your king you will have obtained a very important profit.

Don't be in a hurry. Do not debilitate your pawns unnecessarily. Go step by step.

An extra-lateral pawn is, in most of the cases, sufficient to win.

It is better to have fewer islands of pawns than your opponent (achieve grouped pawns).

Passed pawns almost always need support.

Rook endgame

The rooks must go behind their own passed pawns to support them and behind the opponent’s pawns to attack them (like in the previous Spassky example).

The rook defends badly enough, but it attacks well enough. When playing the rook endgame you must consider the following premise. Often it will even be necessary to sacrifice material in exchange for activating the rooks. For example, a pawn sacrifice can be justified if the rival rook is comparatively less active than yours. Always play rook endgames very actively.

If you are the attacking side and you can, cut off the passage of the opponent's defending king.

Rook and three pawns against knight and three pawns on his own side, is generally a victory for the rook.

Rook and three pawns against bishop and three pawns on his own side, should be a victory for the rook, but problems can arise if the pawns are located on squares of the color opposed to the bishop.

Rook and three pawns with a lateral passed pawn on the other side, against rook and three

pawns. The result depends on from where the rook is attacking (if it is behind the pawn, it should to be able to win; if it is alongside it, there are very good expectations, but if it is in front, the tables are turned).

Bishops of the same color endgame.

If you have two pawns, you should win with ease.

If you have a single pawn, it will be more difficult to win if the defending king is in front of your pawn. That is, except for this circumstance, you should be able to win.

Bishops of a different color endgame.

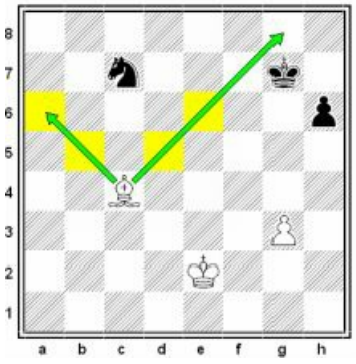
If you are the attacking side, you will try to place your pawns on squares of colors opposed to your own bishop and you will advance them when you can advance them two ranks (essential almost always is the presence of your king).

If, on the contrary, you are the defending side, you should try to block the rival pawns on the squares of the color of your bishop, if supporting yourself with the king is possible (in fact, often it is essential). If you have pawns, you should locate them on squares of the same color as your bishop.

Knight against bishop or bishop against knight endgames

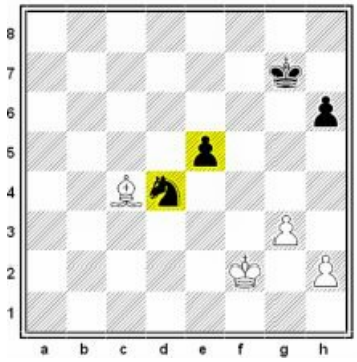
If the position has pawns on both sides and is open, the bishop will have an advantage, as it can attack different pawns from a distance.

If you are the side that possesses the bishop, you should: place your pawns on colors opposed to those of your bishop, attempt to make the structure of pawns open and the game fluid, to advance the pawns and look for spaces and, finally, forget about the fact that you cannot control the rival knight situated on its four squares.



If you are the side that possesses the knight, you should: try for closed pawn structures,

generate advanced positions for the knight (those squares that are defended by pawns and are attacked by the opponent's pieces), to block the enemy pawns.



Knight against knight endgames.

Generally, you will apply these same ending concepts to the endgames of pawns without pieces in such a way. The presence of the knight usually does not mean a different positional interpretation. An exception to this axiom is that the passed rook's pawn fights better against a knight (when it does not have the support of the king) than the rest of the pawns, whereas when we do not have knights, the rook's pawn is usually considered inferior.

Backward pawns are usually even worse with the presence of knights.

III. THE MAGICAL VALUE OF THE PIECES IN THE ENDGAME

Generally we both know all the values of each piece: the absolute value that is the one that that piece has at the beginning of the game, and the relative value is the result of the value of the piece within its context. For example, a rook in a closed position in which it does not have files to move could be worse than a knight that can jump over the pawns and would count on more mobility.

Next to these two values, I want you to learn a third value, that could well be a subtype of the relative value, but I separate it because it is completely visible in the endgame.

As the game advances and we are entering into the endgame, the pieces gain and lose value, not only by the context, but by the phase in which we find ourselves. Therefore, the value becomes a question also related to the time of the game. I call it the "magical value" because, somehow, it is a subsequent value, that appears as if "by magic", although in fact it has its explanation.

The rook, the pawn and the bishop are the pieces benefitted by this magical value. Due to their long reach and to the fact that the pawn can become a superior piece, these three can gain value. The opposite happens with the knight, that as we approach the endgame the knight is

losing value. The queen also loses value, although by much lower amount compared to the knight.

As always in chess, it is necessary to put all the elements in line: absolute, relative and magical value.

Let us see a synthesis of this value:

Queen against two rooks

In the **middle game** they're equal.

In the **endgame**, the rooks are something more powerful. If there are no pieces on the board, two rooks are equal to a queen and a pawn.

A rook against two minor pieces

In the **opening** and in the **middle game**, a rook and two pawns are weaker than two bishops, equal or slightly weaker than a bishop and knight and equal to two knights.

In the **endgame**, a rook and a pawn are equal to two knights and equal or slightly weaker than a bishop and knight. A rook and two pawns are equal to two bishops.

The bishops are stronger than the rooks in the **opening**, less strong in the **middle game,** and in the **endgame** the rook dominates any smaller piece.

Two rooks and a pawn against rook and two minor pieces

In the **middle game**, it is better to combine a rook and two minor pieces because they have greater effectiveness at the time of attacking the king.

In the **endgame**, value is more or less equivalent.

Two rooks and a pawn against a rook and two minor pieces

In the **middle game**, the force is equal if the smaller pieces are a knight and bishop. If they are two bishops with a rook, this combination is favorable.

In the **endgame**, two rooks and two pawns are stronger than rook + knight + bishop, and more or less equivalent to a rook + two bishops.

As you can observe, there exist many combinations, implying no need to memorize them. The important thing is that you understand the concept and this direction of the game. The pieces with long reach will improve their value and those of short reach will diminish in value. The pair of bishops, for example, in the endgame works better than the combination of bishop and knight, because the bishops complement each other, so that one covers the deficiencies of the other.

E. Competing better: the power of confidence

Psychological preparation is a very important element at the time of competing. It is difficult to treat this subject deeply in a manual that it is not dedicated exclusively to it, but, at least, I would like to offer you some guidelines that will help you to compete better.

One of the factors that, from my point of view, holds more influence in competition is

confidence. But confidence is not an absolute one. It exists at many intermediate points; in fact, overconfidence is highly detrimental.

Confidence improves considerably with one's training, without having to do anything else to harness it. And with positive results. Many of the people who feel a lack of confidence in their games feel it because, simply, they have not acquired the technical resources necessary to be able to confront the game. And the absence of confidence is an alarm that, sometimes, we do not want to hear. But this aside, confidence has much to do with the point of view from which we observe the world, what we told ourselves and how we respond in instances of success or future failure.

Probably one of the most frequent requests for advice that I receive on www.thezugzwangblog.com is related to confidence.

1. Self-confidence: don't be passive when facing circumstances

It is disconcerting to see **how somebody openly renounces defending** when faced with a troubling position. It is most striking when the player facing hardships really has the ability to be able to do it and, paradoxically, is vulnerable and afraid.

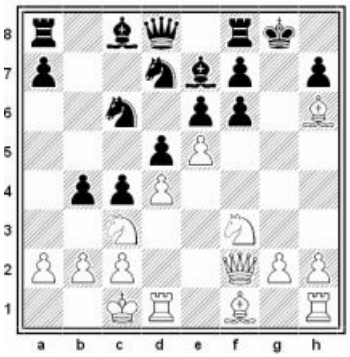
I will always remember a game that I played years ago against a promising Spanish player for whom all the circumstances of which I am speaking occurred. I played with Black, my opponent entered into a line of the French defense that is favorable for Black and that entails an exchange sacrifice. I had the impression in the game that my opponent did not consider said favorable sacrifice as a sacrifice on my part and, yes, this was an error. The position was as follows:

Domínguez Alcón, Victor (2113) - Muñoz Sanchez, Daniel (2083) [C11]

Liga Madrileña, 2014

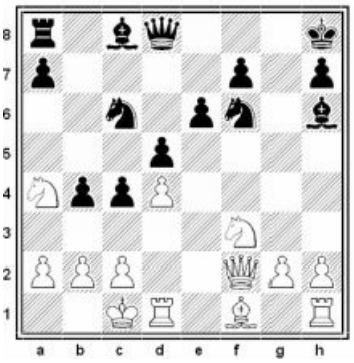
1.e4 e6 2.d4 d5 3.Nc3 Nf6 4.e5 Nfd7 5.f4 c5 6.Nf3 Nc6 7.Be3 Be7 8.Qd2 0–0 9.0–0–0 c4 10.f5 b5 11.f6 gxf6 12.Qf2 b4 13.Bh6

Black to move. Take a few minutes to analyze and familiarize yourself with it.

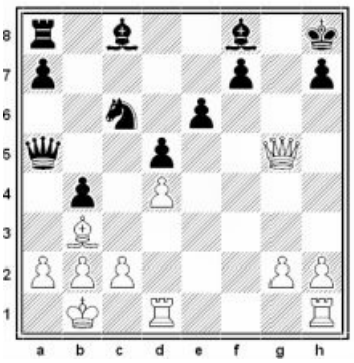


White threatens to take the rook, but, if it does, the resulting structure of pawns and the activity of the dark-squared bishop will be very favorable to Black and it will have the advantage. My move was:

…Kh8! 14.exf6 Nxf6 15.Bxf8 Bxf8 16.Na4 Bh6+



This is the resulting position of the Black sacrifice. Black sacrificed points but, in return, it has a powerful dark-squared bishop that compensates for the inactivity of the rook on h1 and the bishop on c8. The game followed thus: **17.Kb1 Ne4 18.Qe1 Qa5 19.Bxc4 Qxa4 20.Qh4 Bf8 21.Bb3 Qa5 22.Ng5 Nxg5 23.Qxg5**.



Black is clearly better, but, as of this moment, due to the fact that my opponent had already realized that his position had been inferior since the opening and the “favorable” swap was not a good idea, he simply "gave up", because his confidence clearly tanked and the combativeness of the opening was all for naught. The rest of the game is not too interesting, however, I will show it to you in case you want to see how it ended.

Qd8 24.Qh5 f6 25.Rhf1 Bd7 26.Rf3 Na5 27.Rdf1 Bg7 28.Rh3 Qg8 29.Rg3 Be8 30.Qh4 f5 31.Rff3 Nxb3 32.axb3 Qf8 33.Rh3 Bg6 34.Rfg3 Kg8 35.Rf3 Qf6 36.Qxf6 Bxf6 37.c3 f4+

38.Ka2 Bf5 39.Rxf4 Bxh3 40.Rxf6 Bf5 41.Rh6 a5 42.Rh4 Rc8 43.g4 Be4 44.Rh3 Kf7 45.Re3 Bg6 46.Rf3+ Ke7 47.Rf1 Rf8 48.Rc1 Kd6 49.c4 Rf4 50.cxd5 exd5 51.Rc5 Rxg4 52.Rxa5 Rxd4 0–1

The preceding has an explanation, which has been called **"learned defenselessness", a behavior acquired through which the person reacts in a passive way as they imagine it impossible for the circumstances to change in their favor**, although reality corroborates that he is perfectly able to confront the difficulty actively (Victor is a good player. I had the opportunity of facing him other times and things were not so easy).

This happens when the opponent has suffered an event previously or experiences in which they were totally deprived of defense and in which case the final consequence was powerlessness and neglect. But we must think not only about situations from days ago or months ago, this also happens due to moves and maneuvers that happened in that same game just minutes or hours ago. Remember that the human does not consider a position without taking into account everything that has happened previously, unlike a computer. Previous plans and decisions affect their assessment of the position, whether it is correct or incorrect. **The less time, the greater weight the past has**. And all that has happened before also leaves an emotional imprint on us.

2. What Seligman has to tell you

The psychologist **Martin Seligman** arrived at this conclusion from an experiment in which he exposed two groups of dogs to the same adverse stimulus: synchronous electrical discharges of the same duration and intensity.

The difference in the two groups was that one had the possibility of stopping the discharge (tightening the handle using the muzzle), whereas the other group was deprived of such an option, although when the group with the ability stopped the discharge, the deprived group also ceased to receive the discharge.

Several tests later, to the second group was also added the alternative of being able to deactivate the current; but, in that moment, only a third of these dogs defended themselves; the remaining two thirds did nothing to protect themselves, in spite of having the tool with which to do it. They were scared and paralyzed, with a feeling equivalent to depression in humans.

3. Conclusions

Some people, when they experience a chain of defeats or errors, they manifest **passivity** when faced with later obstacles.

They think that "no matter what they do, it does nothing for them, because they do not have control over the circumstances"**,** so that they end up acquiring **a victim behavior when faced with new problems**, even when they have the resources to solve them.

This would corroborate the power of the expectations on our own behavior: if you think that

you cannot, you will not be able. Contrary, there is a decisive percentage of people who, even when "chaining" errors and bad results, overcome it, actively and resolutely and, looking for and **recognizing their own resources** of "staring down" adversity.

These last ones tend to be **more optimistic, thinking the misfortunes are temporary and considering them much more marginally affecting performance and controlling the situation** (“I will always be able to do something better to face adversity.”).

Of all this can be argued that: time lived does not have to condition you as much. An uncomfortable or undesired past can explain, but not justify, your fear of loss. When you stop wasting time complaining or "feeling sorry for yourself", sometimes the solution is staring you in the face and you don't bother to lift your head up to see it. **When you really think that you can get up, you more easily find the way to do it**.

4. Some additional guidelines

Before a tournament, review your better games. Reliving your successes is one of the best ways to face a competition.

Listen to music that motivates you, that makes you feel positive emotions and that separates you from your logical concerns about the competition.

Do not try to replace your motivation with aggressiveness; you will not arrive at the game with the suitable emotional tone.

Do not tie your personal success to your success in chess. Chess enchants us, we want ourselves to win and to obtain good results, but very few people are able to make a living as players, and do not get to be the best one or, even, if we could not ever play again it should not seem like the "end of the world." Relativize.

Avoid forcing your progression with exhaustive training.

Introduce anti-routine elements into your preparation, activities that are not planned and that suppose something “abnormal”, outside the daily agenda.

For a relatively short time, I have been beginning to work on meditation techniques. I believe that it is the most powerful tool with which you should amplify your knowledge. The results that I am obtaining are very beneficial.

Exchange the idea of winning for one of amusing yourself, in some people, this produces amazing changes. They play relaxed and with a sense of wellbeing.

Get to work: my plan of training

A. *Coachess*. Tools for success

Throughout the whole the book, I have been making different references to technique, sport or purely chess aspects that are fundamental so that you take your game to the next level. But still there is something much more important than all the above. In fact, I thought about incorporating this text in an initial chapter of the book, with the objective of it having all the possible predominance.

The success of this plan is going to depend exclusively on you. All the above is a set of reflections, techniques, plans and directives that are arranged to be used, but it is necessary that you become a person of action not solely a person of thought.

In order for good chess planning to be successful, you must first have a good attitude. Your attitude will be what multiplies or divides the results of the actions that you carry out. For that reason, I really want to give you several guidelines before you really delve into this adventure.

1. The force of desire.

It's not a "no-brainer." What do you want exactly? To improve your rating? To win more games without competing? To win more games to cover up some personal deficiency? To win in order to make an impression? To play better to be able to give classes? To know how far you can go? I repeat, what do you want exactly?

Behind any action of the will is an underlying element that is the one that mobilizes us. And it is fundamental that we are not deceiving ourselves. Perhaps if you do not know what you want and you start down the path, you arrive at a place in which you do not want to be. Probably, we all want to have more money, but behind that desire there are different intensities and reasons. The statement of, "What do you want?", that unique phrase, is going to determine, powerfully, the relationship with that which happens in the future. In addition, it is very important, I would say substantially so, that you establish your expectations clearly to establish further goals that lead you toward the higher goal you have set.

2. From thought to mobilization

One cannot advance without getting started, taking ownership and responsibility, taking the reins of what is happening. Chess has the defect, or the virtue, of exposing with clarity who we are in a certain scope of our life (chess) and when faced with this, people develop multiple roles and attitudes.

Recently, I played a game with a player who had been playing for years, but he had not surpassed 1600 ELO points. In the game, he swapped a bishop for a knight, clearly in opposition to the character of the position at that moment. It was an open position in which, after the change, my bishop dominated without opposition a great diagonal and I remained superior. The game went on developing with many other errors on the other hand and, finally, my opponent lost. While we commented on the game, I tried to explain to him that the entire problem had been triggered by that exchange in the opening. Nevertheless, he argued that “a bishop with two knights combines better than two bishops”, a really bizarre explanation for any person who has minimal knowledge. But what I want to point out, beyond the technical peculiarities of this position, is that even against our strong convictions, we must want to change something, to be aware and "get moving."

Statistics say that **95% of the population lives without objectives**. And this is something that can be totally legitimate but, in chess, and I suppose in many other scopes of life, if you want change to happen, it is necessary that you try to influence what surrounds to you. The absence of control just leads to a lack of results.

3. Discipline

Discipline is something that precedes the habit. It is making the decision to do something, even if you do not want to do it. And its only secret is motivation. If you have a motivation, the discipline will follow as if by magic. For this reason, it is so important that it is totally clear what you want. What you really want, with the heart. Poor desire will become a poor result.

How many people do you know that have started a diet and then gave up? The problem was not the diet; it was the self-discipline of these people. You will know that you are acting with discipline when you have changed something in each one of your days over many days, and you are intensely dedicating yourself to fulfilling your objectives. As was explained previously, the objectives can be modest or ambitious. I am convinced that the difference between the fulfillment or not of an objective is something outside of talent. Any player, having the talent that he/she has, can achieve a minimum of 2100 points of FIDE ELO. I myself established that objective years ago: to arrive at 2100 points of FIDE ELO, nothing extraordinary, but I was able to do it. Before good planning, the merit was in the discipline.

4. Proactivity The science of responsibility

Good players bear the responsibility of their games but, before that, they bear the responsibility of their preparation. They almost literally put on their backs the weight to move forwards and do all possible to achieve such that their decisions modify their circumstances, without questioning it. The difference between maintaining passivity, when you really want to improve, hoping that playing friendly games one day results in a miraculous improvement, and

taking the initiative is exponential.

And being proactive also is the prelude to determination. It consists of having decided early that, what happens, happens; you are going to follow through. Perhaps beginning is the easiest; the most complicated thing is when in spite of the efforts bad results appear, doubts, the fluctuations in performance. **But what separates success from failure is persistence**.

5. The taming of the EGO

Pursuing success is something positive, but forsaking all and leaving your life behind in that pursuit is not. Also, it is true that the ego mobilizes us, and we all have one. But to put too much of us into our preparation ends up changing the focus of the work to results, confusing what we do with that which we are and this is an enormous source of frustration.

Observe your inner dialogue closely. Much of it has been programmed into you since you were young, but identifying it can be a fundamental step toward changing the things we tell ourselves. Somebody with a success mentality is concentrated on identifying these instructions that live within them and he or she does not allow them to be replicated, because they weigh him or her down.

If your desire and your commitment are clear and you maintain a disciplined attitude, the results will arrive inevitably, without "forcing yourself to win." Accept any type of result with humility. Starting from the basis that, as knowledge increases, so will your ignorance. This will help you brush off the criticism, advice and rather work on self-improvement.

6. Surround yourself with the best.

The proverb says: "*If you want to go fast, go alone. If you want to go far, go together.*" It is difficult to be able to arrive at an interesting place alone. Usually one says that we are the result of the five people with whom we spend the most time. The effects that our surroundings produce in us is something well known and tremendously valuable.

Speak with players of a higher level than you. If you can go to prestige tournaments, speak with grandmasters, ask questions, relate and connect with them. Don't be ashamed. Now we have the possibility of connecting more than ever through social networks and they are an excellent tool to obtain a two-way communication. Consult those who know more than you with humility and, if you can, play with players who are much stronger than you: their level will propel yours.

But not only that: look for productive contexts for yourself and integrate them. They are those that enhance your resources. And try to avoid those that repress them (those that, unfounded, criticize your work or they have objectives different from yours).

We are totally influenced by everything that we see and feel. In groups of people, a flow of emotions exists that is much more than the sum of the individual emotions. You will have experienced it when, for example, you change departments at work or are with a group of friends

or others. There is something that extends to the sum of the individuals and it transfers to us. One feels different, although we have not interacted with the immediate surroundings. We do not feel the same with our family, as with our friends, as in a chess tournament or elsewhere. Something inexplicable exists. When you are in favorable surroundings, your talent expands and your personal development flows with ease. The opposite is like walking with a fifty-pound knapsack on your back.

> *"To follow the path, look to the master, follow the master, walk with the master, see through the master, become the master."* (Zen Proverb).

B. "Setting goals: a 10-week training plan."

Once you have acquired commitment to move yourself forward, this is the time to set objectives. Many players fail in their intentions by a simple explanation: they have not set objectives.

The absence of objectives is more than the absence of a destiny: it is the absence of a map. And unless you've ever been in the place that you want to go, you will not know how to get there. To *The Zugzwang Method,* we will set as an objective that you progress to a higher level, that is to say, if your level is beginner (1400-1700 ELO), we will aim at making you an intermediate level. If your level is intermediate (1700-2000 ELO), that you arrive at an advanced level (2100 or more).

You yourself can look to others, more or less ambitious than these. The important thing is that your objectives are S.M.A.R.T.: Specific, Measurable, Attainable and Realistic and Time-bound. And you must consider that great changes require time. Unless you are a virtuoso in chess, like the few virtuosos whom there are in the world, you will have to be patient. Patient such as when you play an endgame correctly.

For the above objective we will break things down into **specific weekly objectives**, following the guidelines that I have explained to you in the book, but turning them into operative tasks, executables. That is to say, we will approach all the previous information that is explained to us in how we have to plan, really plan day to day. This will help you control your evolution, that is to say where you are, and to measure your results. You will have to work more than you do now surely, but much more important is that the intensity is applied with certainty and intelligence. Put all your effort forward and never listen to anyone who says it's impossible. To me, they said it.

> "*Those that use their time badly are those that complain about its brevity.*" (Juan Luis Cebrián).

The plan of weekly training is designed based on your level of game. The necessities and

deficiencies of a player at beginner level are not the same ones as those of a player at intermediate level; for that reason, the preparations are different as much in their progression as in their content.

The plan that we have prepared for you is a 10-week plan that is modified over time. In these 10 weeks, you will see your level clearly increase, but, to see very visible results, you will have to prolong it during at least a year. Hence, as we explained to you at the beginning of the book: I want to show you how to fish, not give you a fish.

The first week, you will have to put in a lot of effort while seeing few results. The second week will take a little less effort, but your results will continue being unsatisfactory. As for the third week, the habit will begin to consolidate and it will take less time and you will produce more. This is the point at which most people abandon their objectives (to learn a language, to lose weight, to run more…). **You also will arrive at this point, but it is vital that you follow through, that you do not stop, although the world around you is collapsing. Don't stop**.

And before presenting to you your **10-week training plan**, I want to explain to you that we are going to measure your results from your present official ELO and that of your unofficial ELO (the one that you have when you play on internet platforms, playchess, ICC, chess24, etc.). Both are good indicators to know if you are progressing or stuck in a rut, although you yourself will feel if you progress or not. Therefore, the plan includes playing weekly games. These games will serve us as a basis on which to work and also to know your progression. If it is possible, play them with real people on a real board. If not possible, as a second option, play on the internet, but use a real board. And you should always annotate them. They are a very valuable resource.

C. Fulfillment of objectives. Much more than verifying them

Sometimes, when we set an objective, we are tempted to verify the result solely and not the process. The process of training in chess is a living thing that goes with you throughout the weeks and it modifies you, but also you modify it. So that the result is optimal, paradoxically, we do not have to be concentrated exclusively on the result. The daily experience is also something that we must consider and manage.

All the work that you are doing daily is shaping a totally customized nucleus of experiences, information and conclusions for you. You know better than anyone what elements of training are those that you like more (those that most "agree with you"), in which you have more difficulties, and in which there is a degree of adjustment of the plan in respect to execution.

For that reason, I recommend to you that you have a training journal. A notebook or a digital document in which you will be logging after each session:

If you have completed the session as planned or not.

Number of exercises performed and failed (or successful).

- Important events that you should consider and reflect upon.
- How you have felt, and the conclusions that you have obtained.

The fact that you are writing a journal will also have an **additional positive effect**: it will help the concepts become better engrained than if you did not. It is best to make records each session. If you have little time, at least record if you've done the session as it was planned or not.

Next, I present two **10-Week Training Plans** to you: first for the beginner and the second for the intermediate level player. Both plans follow all the criteria of this manual, and they will serve you as an example so that you yourself can elaborate and develop your own plans. You will observe that both contain "an obligatory" working time and "an optional" part if you desire and you are more ambitious. It is not advisable that you exceed this study time and preparation if you do not already have a routine habit in place.

The planning is distributed in the following concepts:

Simple tactical exercises grouped by thematic motifs : They are those tactical exercises in which there is a clear closing; i.e., winning the game by checkmate or material, and are grouped by themes (double attacks, discovered attacks, x-ray…). Complete a whole block of exercises before correcting them. You will even see that in many sessions I propose to you that you correct them another day.

Simple tactical exercises : In these cases, the exercises also have a unique closing, but you do not know beforehand which it is. That is the difference with the previous ones. You can find them in different books and webpages. For either exercise, I recommend *to you "Test your chess IQ"*, vol. one and later vol. two (or vol. three if your level is very high). Also, you can find them at http://chess.emrald.net/ and in the exceptional free tool from chessbase: http://tactics.chessbase.com/?lang=en If you have some kind of budget, I recommend you opt for a paid tool (CT-ART) that, for the price, is frankly exceptional: http://chessok.com/shop/ Complete a whole block of exercises before correcting them. You will even see that in many sessions I propose to you that you correct them another day.

Positional Exercises : The resolution of the exercise does not consist of a tactical closing but of the resolution of a positional or strategic question. I recommend Cuadernos prácticos de ajedrez. Problemas de estrategia, by Antonio Gude (in Spanish only), the product of Convekta Chess Strategy, which costs about $20 with selected very high-quality exercises, or that you yourself look for your positions in the games of grandmasters covering the play that follows (many good examples later), you can find them in the book Zurich International Chess Tournament, by Bronstein. A genuine classic.

Additionally, I recommend to you stop by the Chesstempo website, that offers a quite complete summary for you of positional motifs (although it does not have exercises) http://es.chesstempo.com/positional-motifs.html.

Calculation Exercises : The calculation exercises are to us merely a final blow, but it is necessary to calculate a position because there exists a lot of contact between the pieces and it is necessary to find the best moves to attack and to defend. You can find these types of examples in combative games from grandmasters like Shírov, Nakamura, Carlsen, Topalov; in my own blog: http:thezugzwangblog.com/; in books like the exceptional *Perfect Your Chess*, by Volokitin and many others you will find regarding calculation. Complete a whole block of exercises before correcting them. You will even see that in many sessions I propose to you that you correct them another day.

Openings : The study of the openings is widely explained in the book. Reread it!

Analysis of your own games : Like the previous, there is a dedicated chapter where I explain how to analyze them without the help of a third party.

The theoretical endgames . A multitude of books on theoretical endings exist. It is difficult to show a preference for a single one, perhaps, but if I had to decide on a book, *100 Endgames that* You *Must Know*, by Jesus de la Villa (available in English and Spanish) or the collection *Excuse the openings, the endgames are fundamental*, by Dragan Barlov and Nicola Karaklajic. Many more exist and also web pages that cover these topics. I recommend to that you take a look at this article on my website: http:thezugzwangblog.com/like-study-the-end-in-chess.

The non-theoretical endgames . This also has a multitude of books, but I encourage you to find your own way by means of the study of endgames that arise in commentated games of grandmasters.

Write to me in English or Spanish contacto@elmetodozugzwang.com and I will send you many more completely free training resources. Exercises with their solutions.

BEGINNER 10-WEEK PLAN

	BREAK
	OPTIONAL

		BEGINNERS Total Time: 3 hours + 1 hour of play approx.						
			Time Dedicated to Training: 90 Minutes/ Time dedicated to study: 90 min					
	Duration	Mon	Tue	Wed	Thur	Fri	Sat	Sun
WEEKS 1 and 2	5 mins	Simple tactical exercises grouped by thematic motif				Calculated exercise Correction		
	10 mins							
	15 mins	Positional Study		Simple tactical exercises without grouping				
	20 mins					Openings	Play (pace of game 15 min minimum) annotating your games	
	25 mins							
	30 mins							
	35 mins							
	40 mins	BREAK		BREAK		BREAK		
	45 mins	Positional Exercises		Calculation Exercises		Openings		
	50 mins							
	55 mins							
	60 mins							
	65 mins	Positional Exercises		Calculation Exercises		Theoretical Endgames		
	70 mins	Positional Exercises		Calculation Exercises		Theoretical Endgames		
	75 mins	Positional Exercises				Theoretical Endgames Exercises		
	80 mins	Positional Exercises				Theoretical Endgames Exercises		

		BEGINNERS Total Time: 4 hours + 1 hour of play approx.						
			Time Dedicated to Training: 135 Minutes/ Time dedicated to study: 105 min					
	Duration	Mon	Tue	Wed	Thur	Fri	Sat	Sun
WEEKS 3 and 4	5 mins	Simple tactical exercises grouped by thematic motif	Simple tactical exercises grouped by thematic motif					
	10 mins					Calculated exercise Correction		
	15 mins	Exercises of simple tactics	Positional Study		Simple tactical exercises without grouping			
	20 mins							
	25 mins					Openings	Play (pace of game 15 min minimum) annotating your games	
	30 mins							
	35 mins							
	40 mins	BREAK	BREAK		BREAK	BREAK		
	45 mins	Study your own games	Positional Exercises		Calculation Exercises	Openings		
	50 mins							
	55 mins							
	60 mins							
	65 mins	Positional Exercises	Positional Exercises		Calculation Exercises	Theoretical Endgames		
	70 mins	Positional Exercises	Positional Exercises		Calculation Exercises	Theoretical Endgames		
	75 mins	Positional Exercises	Positional Exercises		Calculation Exercises	Theoretical Endgames Exercises		
	80 mins	Positional Exercises	Positional Exercises		Calculation Exercises	Theoretical Endgames Exercises		

		BEGINNERS Total Time: 4 1/2 hours + 1 hour of play approx.						
			Time Dedicated to Training: 155 Minutes/ Time dedicated to study: 115 min					
	Duration	Mon	Tue	Wed	Thur	Fri	Sat	Sun
WEEKS 5 to 10	5 mins	Simple tactical exercises grouped by thematic motif	Simple tactical exercises grouped by thematic motif		Simple tactical exercises without grouping Inverted	Calculated exercise correction	Play (pace of game 15 min minimum) annotating your games	
	10 mins							
	15 mins	Exercises of simple tactics	Positional Study			Openings		
	20 mins							
	25 mins							
	30 mins							
	35 mins							
	40 mins	BREAK	BREAK		BREAK	BREAK		
	45 mins	Study your own games	Positional Exercises		Calculation Exercises	Openings		
	50 mins							
	55 mins							
	60 mins							
	65 mins	Positional Exercises				Theoretical Endgames		
	70 mins	Positional Exercises				Theoretical Endgames		
	75 mins	Positional Exercises	Positional Exercises		Calculation Exercises	Theoretical Endgames Exercises	Playing	
	80 mins	Positional Exercises	Positional Exercises		Calculation Exercises	Theoretical Endgames Exercises	Playing	

INTERMEDIATE 10-WEEK PLAN

	BREAK
	OPTIONAL

		INTERMEDIATES Total Time: 3 hours + 1 hour of play approx.						
			Time Dedicated to Training: 125 Minutes/ Time dedicated to study: 55 min					
	Duration	Mon	Tue	Wed	Thur	Fri	Sat	Sun
WEEKS 1 and 2	5 mins	Simple tactical exercises grouped by thematic motif						
	10 mins					Calculated exercise Correction (from Wed)		
	15 mins	Positional study		Calculation Exercises (without correcting them)				
	20 mins							
	25 mins							
	30 mins					Openings	Play (pace of game 15 min minimum) annotating your games	
	35 mins							
	40 mins	BREAK		BREAK		BREAK		
	45 mins	Positional Exercises		Calculation Exercises (without correcting them)		Openings		
	50 mins							
	55 mins							
	60 mins							
	65 mins	Positional Exercises		Positional Exercises		Theoretical endgames		
	70 mins	Positional Exercises		Positional Exercises		Theoretical endgames		
	75 mins	Positional Exercises				Theoretical endgame exercises		
	80 mins	Positional Exercises				Theoretical endgame exercises		

		INTERMEDIATES Total Time: 4 hours + 1 hour of play approx.						
			Time Dedicated to Training: 140 Minutes/ Time dedicated to study: 130 min					
	Duration	Mon	Tue	Wed	Thur	Fri	Sat	Sun
WEEKS 3 and 4	5 mins	Simple tactical exercises grouped by thematic motif	Simple tactical exercises grouped by thematic motif					
	10 mins					Calculated exercise Correction		
	15 mins	Positional study	Positional study		Calculation Exercises			
	20 mins							
	25 mins					Openings	Play (pace of game 15 min minimum) annotating your games	
	30 mins							
	35 mins							
	40 mins	BREAK	BREAK		BREAK	BREAK		
	45 mins	Positional Exercises	Positional Exercises		Calculation Exercises	Openings		
	50 mins							
	55 mins							
	60 mins							
	65 mins	Positional Exercises	Mixed endgames exercises (Theoretical and non Theoretical)		Calculation Exercises	Theoretical endgames		
	70 mins	Positional Exercises			Calculation Exercises			
	75 mins	Positional Exercises			Calculation Exercises	Theoretical endgame exercises		
	80 mins	Positional Exercises			Calculation Exercises	Theoretical endgame exercise		

		INTERMEDIATES Total Time: 4 hours 50 min + 1 hour of play approx.						
			Time Dedicated to Training: 140 Minutes/ Time dedicated to study: 130 min					
	Duration	Mon	Tue	Wed	Thur	Fri	Sat	Sun
WEEKS 5 to 10	5 mins	Simple tactical exercises grouped by thematic motif	Simple tactical exercises grouped by thematic motif		Calculation exercises without correcting them	Calculated exercise correction	Play (pace of game 15 min minimum) annotating your games	
	10 mins							
	15 mins	Study your own games	Correct calculation exercises from mon			Openings		
	20 mins							
	25 mins							
	30 mins							
	35 mins							
	40 mins	BREAK	BREAK		BREAK	BREAK		
	45 mins	Positional Study	Positional Exercises		Calculation or tactical exercises (alternated each week)	Openings		
	50 mins							
	55 mins							
	60 mins							
	65 mins	Calculation exercises without correcting them	Mixed Endgame Exercises (theoretical and non)		Calculation Exercises	Theoretical endgames		
	70 mins				Calculation Exercises			
	75 mins				Calculation Exercises	Theoretical endgame exercises		
	80 mins				Calculation Exercises	Theoretical endgame exercises		

D. How to manage failure

In a time not long ago, I read an interview that Francisco Vallejo granted to digital media and emphasized, in a forward way, the drama that is often involved when a player is faced with defeat. In some articles, I have spoken of this: the chess player does not have teammates, nor does there exist a referee to blame for bad calls. The player is the only person in charge of what happens on the board, and after five or six hours of game, and enormous nervous tension, a single error is sufficient to lose the game. Can you imagine a basketball or soccer game, in which losing control of the ball once to your opponent means that the game is over? And yet, so it seems in a game of chess.

I have known players who have decided to stop playing simply because they had no ability to face this type of defeat. Until getting control of it, I myself spent weeks punishing myself for my errors. To this day, I even can remember errors of many years ago, which are worse because, as we discussed, memories attached to strong emotion are more impactful.

I wanted to incorporate this small chapter in *The Zugzwang Method* because, many of the people who are reading this now have felt, sometimes, that sensation of "failure", of no benefit to playing or no ability to do more to boost their game.

In the school or the university there does not exist a subject called "Failure Class." We probably all need that class, but the reality is that it never arrived. Chess offers some pills to us that, with the passage of time and a good amount of abstraction, are introducing us to the world of the failure in a positive and constructive way, although it might not feel that way at the time.

The approach, which I want to transfer in this book, is clearly in favor of the failure. **The victories are deserved, but the defeats are needed**. For some reason, the perception of success is bound to the idea of infallibility. If all goes "too" well and you do not recognize any errors, your achievements seem more consistent, more deserved. But the reality is that success in general, and the improvement in your level of game in particular, they are much more bound to the recognition of said errors and tolerance of them to the point of negation. Somebody said that the difference between success and failure is solely persistence. Maybe it's an exaggeration or maybe not.

These are the elements shared by the people who carry out positive management of failure:

1) ***The good player of chess auto-refutes*** . When a decision is made on the board, don't affirm it as a good move, and to a lesser extent like the best move, but like a possible and valid move, and that surely it has a good answer on the part of the opponent. From that existential, almost philosophical, position, the player already accepts

intrinsically a probable error, in spite of doing everything possible to avoid it.

2) The good player is necessarily humble. When one speaks with the best players and proposes a problem to them on the board, only in rare cases do they answer emphatically. This respect for the complexity of the game also aids at the time of confronting defeat. Many years ago I had the opportunity to share with Vladimir Kramnik the analysis of a speed game in a visit that he made to Madrid (Spain). In spite of being one of the best players of the world, he was surprisingly prudent in all his commentaries: "the best thing seems…", "surely, if we do this…" If you want to progress and it flows from a prior humility and accepting the difficulty of the challenge, it is much less painful to "integrate" the nonattainment of the objective. But that doesn't mean having to leave!

3) The good player faced with defeat is not alone in the failure . Kyle Rote Jr. said: "*There is no doubt in my mind that there are many ways to be a winner, but there is really only one way to be a loser and that is to fail and not look beyond the failure.*" Review what has happened and, as John Maxwell says, "*since you fell, at least pick something up.*" You do not have to perform an academic exercise, focus solely on what has happened. What produced the error? What you can do to avoid it in the future?

4) A good player takes responsibility of his or her errors . They expect from the future continued failures, but they don't feel limited by the errors of the past. Persevere. Understand that lessons have to be learned and until they are, they will repeat themselves.

Finally, I would like to finalize this book with the words of former champion of the world Garry Kasparov when they asked him a question about his eternal rival Anatoly Karpov. We do not forget that the duel between Kasparov and Karpov, followed in the 80s by a million people all over the world, was not only reflected on the boards. Each one was a symbol of a way to understand life and the world. Karpov was the symbol of the Soviet ideal: communist, member of the Soviet parliament and president of the Soviet Foundation for Peace; whereas Kasparov was the son of change, that would have transformed the Soviet society until it disappeared. Then,

to this question, Kasparov replied: “*Thanks to him (*to Karpov*) I was able to improve.*”

Biographies

Daniel Muñoz Sanchez (author)

Born in Madrid (Spain). Received a Master's Degree from Universidad Complutense of Madrid. Psychology has always interested him. Therefore, he obtained his Masters in Neurolinguistic Programming and Emotional Intelligence.

At age seven, he began to play chess and has not stopped since. He had the fortune of competing in the Honor's Division of Madrid League, although before this he passed through all the other divisions. He has taught chess teams of amateur players, individual competitors and children.

For two years, he has been divulging what he knows about chess on his webpage: www.thezugzwangblog.com

Also, he is a collaborator for the prestigious online magazine Chessbase.

He himself put into practice the ideas that are shared in this book. Thanks to it, he increased his FIDE ELO from 1976 to 2100.

The Zugzwang Method is his first book.

Grand Master Herminio Herráiz (coauthor)

Born in Pedroñeras (Spain). He studied Mathematics at the Complutense University of Madrid. He has played at the highest level, representing Spain in the 2004 Olympic Games in chess and competing in important international tournaments (third place in the Championship of all of Spain, University Champion of Spain, first place in the Magistral de Elgóibar…). At the moment, he has a FIDE ELO of 2456 and is a FIDE Trainer (superior FIDE title).

Although he is a professional player, he dedicates a great part of his time to developing new talents and other grandmasters of international prestige. Also, he gives seminars and conferences on chess.

The Zugzwang Method is the first book in which he has participated as a coauthor. To the Grandmaster, the chapter on openings is attributed (the keys to play, how to study them and how to construct a useful repertoire).

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