

# YOUR JUNGLE GUIDE TO ROOK ENDINGS

by  
Efstratios Grivas



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# KEY TO SYMBOLS

!	a good move
?	a weak move
!!	an excellent move
??	a blunder
!?	an interesting move
?!	a dubious move
□	only move
=	equality
∞	unclear position
∞	with compensation for the sacrificed material
±	White stands slightly better
∓	Black stands slightly better
±	White has a serious advantage
∓	Black has a serious advantage
+-	White has a decisive advantage
-+	Black has a decisive advantage
→	with an attack
↑	with initiative
↔	with counterplay
△	with the idea of
▷	better is
≤	worse is
N	novelty
+	check
#	mate



# FOREWORD

Dear Reader,

In my younger chess years, in the early 80's, I was lucky enough to have as my main coach the legendary Dr. Nikolay Minev. He had been an Athens resident for approximately two years before immigrating to the United States. He mainly worked with Greece's National Men's Team, but also with a group of promising youngsters, including myself.

Dr. Nikolay Minev was a prominent coach, quite educated both in life and chess and he acted as my second father helping me to develop into a Grandmaster. He was quite fond of the great Akiba Rubinstein and of rook endings. It is no coincidence that he wrote several books on those two subjects!

It was natural that I was inspired by his work and I also tended to fall in love with Akiba and rooks! In my chess career I have played many rook endings, quite brilliantly in most of them. I studied them with one of the best and I became quite proficient at them!

Having completed my playing career and become a top-level coach it is my turn to author a book on rook endings dedicated to my wonderful coach. I chose to write a book on advanced rook endings as I simply did not wish to write another book that would be like the many already available.

I have done my best to present analysis and articles I have written over the past 10–15 years. This work has been presented in my daily coaching sessions, seminars, workshops, etc. The material has helped a lot of trainees to develop into quite strong players gaining international titles and championships.

Now, it is your turn to taste and enjoy it!

*Sharjah 2019*  
*Efstratios Grivas*

## ANALYSIS OF THE PROJECT

**Chapter 1** deals with basic knowledge: the Lucena, the Philidor and the Van-cura positions. As nearly all rook endings will result in one of these three positions it is necessary that we go over the basics before advancing to more complex material.

**Chapter 2** deals with some extraordinary endings with rook pawns and rook(s) vs a fair number of pawns! This is a difficult subject where concrete knowledge is demanded.

**Chapter 3** will teach us how to deal with pawns on the same side and if and how we can take advantage of our extra material.

**Chapter 4** is probably the most complicated of endings with 3 vs 3 pawns with an extra a, b, c or d pawn. In both cases the active or passive rook is examined.

**Chapter 5** deals with shattered pawns on one or both sides and how the healthy side can prevail.

**Chapter 6** teaches us how to benefit from a useless isolani in the endgame.

**Chapter 7** instructs us on how to hold drawn endings. Many such endings have been lost by high rated players due to a lack of accuracy.

**Chapter 8** is full of rooks! We will examine endings with four rooks on the board. This is not an easy situation as many new elements are presented.

**Chapter 9** concludes the book and the subjects are Lasker's Steps, the Trapped Rook and the Loman Move.

# DEDICATION TO DR. NIKOLAY MINEV

This book is dedicated to my great Coach Dr. Nikolay Minev. Back in 1981 & 1982 he coached me from being an ordinary kid in the neighborhood to an adult chess player. He made me understand what chess is and how to deal with it both as a player and as a coach. May he rest in peace.

Nikolay Minev (8 November 1931 – 10 March 2017) was a Bulgarian International Master (IM) and noted chess author. N.Minev was awarded the IM title by FIDE in 1960 and he was the champion of Bulgaria in 1953, 1965, and 1966. He played for Bulgaria in the Chess Olympiad six times (1954, 1956, 1958, 1960, 1962, and 1966). N.Minev's best international results were 3rd at Varna in 1960, 2nd at Warsaw in 1961, tie for 1st at Sombor in 1966, and 2nd at Albena in 1975. He contributed to early editions of the 'Encyclopaedia of Chess Openings' and the 'Encyclopaedia of Chess Endings'. N.Minev and his wife immigrated to the United States in 1982 and settled in Seattle, Washington. He was associated with GM Yasser Seirawan and his magazine 'Inside Chess' in the 1980s and 1990s.



# THE TECHNICAL POINT OF VIEW

It is a testimony to the accuracy of the author's original analysis that only twenty or so substantive changes have been made in the 206 relevant games and studies contained herein.

It is interesting to see how the author's original work benchmarks against the definitive knowledge of the databases. Of course, some deep wins are 'over the horizon' but even shallow tactical shots can be missed by an over-enthusiastic pruning of the search tree.

Zugzwang situations can confuse the computer if the 'null-move heuristic' is not switched off and fortresses can be rendered magically invisible.

Guy Haworth  
London, September 2019

\* \* \*

Guy Haworth is an Honorary Fellow in computer science at the University of Reading.

Over the years he has championed the creation and use of chess endgame databases, mainly in the pages of the ICGA Journal.

Guy's specific contribution was to extend the author's sub-7-piecer database checking of the positions. He has used Ronald de Man's DTZ50 endgame tables rather than the 'Lomonosov DTM(ate)' ones. Thanks should go to Ronald de Man, Bojun Guo (for the tables) and Niklas Feikas (for the site, <https://syzygy-tables.info>) which deserves more publicity.



# THE ENDGAME

150 years ago, the quality of played endings was quite low as chess players rarely reached the endgame!

As strategy and maneuvering were starting to overcome tactics more and more endgames were suddenly seen. As a result, a need for endgame material became essential.

‘Basic Chess Endings’ (abbreviated BCE) is a book on endgames which was written by Grandmaster Reuben Fine and originally published on October 27, 1941.

It is considered the first systematic book in English on the endgame phase of the game of chess. It is the best-known endgame book in English and is a classic piece of chess endgame literature.

The book was dedicated to World Champion Emanuel Lasker who died in 1941 (the year the book was published). It was revised in 2003 by Pal Benko.

‘Basic Chess Endings’ was written by Reuben Fine in only four months and was published in 1941 by McKay (a division of Random

House) in hardback. The book used the now obsolete descriptive chess notation and used the old system of using the abbreviation ‘Kt’ to stand for knight instead of the more modern ‘N’.

In a 1984 interview Fine said that it took him three months to write the book. He said that organizing the material gave him no trouble, but it was hard work coming up with exemplar positions therefore he created many of the examples.

There was a Hardback Limited Edition of 500 signed by Ruben Fine and sold by the USCF in the 1940s. The hardback edition was reprinted at least as late as 1960. The copyright was renewed in 1969 as the book went through many paperback impressions. It went through ten printings in paperback by 1981.

The original book contains 573 pages and 607 diagrams of positions. Many other positions were given by listing the location of the pieces rather than showing a diagram. The 2003 revision contains 587 pages with 1330 positions, most with diagrams.

Many other good books followed BCE. They were written by Yuri Averbakh, Vasily Smyslov and Paul Keres. But all of them had some analysis flaws as well — it was rather difficult to be accurate.

## COMPUTER EVOLUTION

The computers' evolution changed everything in the way we learn and analyze endgames today, at least to some degree!

Nowadays chess players have access to many good and accurate endgame books, mainly because of the tablebases which changed our endgame vision.

These tablebases contain the game, the theoretical value (win, loss or draw) of each possible move in each possible position and how many moves it would take to achieve that result with perfect play.

The tablebases act as an oracle always providing the optimal moves. Typically, the tablebase records each possible position with certain pieces remaining on the board and the best moves with White to move and with Black to move.

Tablebases are generated by retrograde analysis working backwards

from a checkmate position. By 2005, all chess positions with up to six pieces (including the two kings) had been solved — this is what we call today the Nalimov Tablebases.

The tablebases of all endgames with up to six pieces are available for free download and may also be queried using web interfaces. They require more than one terabyte of storage space.

By August 2012, tablebases had solved every position with up to seven pieces. The positions with a lone king versus a king and five pieces were omitted because they were 'rather obvious'. Today we call this the Lomonosov Tablebases. The size of all tablebases up to seven pieces is about 140 TB.

The solutions have profoundly advanced the chess community's understanding of endgame theory.

Some positions which humans had analyzed as draws were proven to be winnable; the tablebase analysis could find a mate in more than five hundred moves. Clearly this is far beyond the horizon of humans and even beyond the capability of a computer during play.

For this reason, the 50-move rule has been questioned since many

positions are now seen to exist that are a win for one side but would be drawn because of the 50-move rule.

Tablebases have enhanced competitive play and facilitated composition of endgame studies providing a powerful analytical tool.

Of course, we can expect the 8-piece version, but I feel that it will be a bit delayed!

Chess players tend to think that theory only applies to openings. This is a very wrong attitude as logic and practice have proven that theory counts for every part of a game.

## ENDGAME THINKING

‘To learn and to play endgames well the chess player must love endgames’ — Lev Psakhis.

Different kinds of endgames have specific characteristics and rules. Every serious player must know many typical positions and main principles of all types of endings.

That knowledge should help us during the game, but it is not yet enough knowledge to make one a good player as there are just too many different endings, some of

them with two or more pieces, some very complex.

To be comfortable and play those complex endings well requires specific knowledge and specific ways of thinking. We will call it ‘endgame thinking’.

First, we will separate endgames into two categories:

SOS Tip 1 – Endgame Categories
1. Tactical – Tactical complex endgames must be treated as a middlegame.
2. Strategic – Pure Endgames.

As in the middlegame our thoughts are busy with calculation based on the specific characteristics of the position.

But more often in our games, as practice proves, we have so-called strategic endgames where even computers have difficulties finding the best moves. These are the endgames that do not rely on calculation.

It is known from the time of Jose Raul Capablanca that in strategic, positional endgames we must think by plans and schemes. Variations and calculation play a secondary role.

First, we must understand where to put our pieces in order to improve the position. After we have this understanding, we start to form a plan. This is what we call ‘endgame thinking’.

Thinking correctly, in the right order, will significantly simplify the process of calculation.

<b>SOS Tip 2 – Endgame Thinking</b>
1. Piece placement.
2. Plan forming.
3. Do not rush!

The question is how to approach ‘endgame thinking’, how to switch on the right button in our brain for the task at hand. The Russian master Sergei Belavenets, a great chess thinker, gives the following great advice:

‘After tactical complications, when our brains have been busy with cal-

culational of beautiful variations the exchange of pieces might follow and some kind of prosaic endgame arises.

Every player has to spend a few minutes, if the clock allows, just to relax, and to calm down your emotions in order to look differently at the position. This investment of time will pay back later in the game.’

I understand this advice was given before World War II when they had very different time controls.

So do not waste your time, just switch on the button in your brain and remember that positional endgames require ‘endgame thinking’ by schemes, by plans.

And do not forget to respect your opponent’s ideas. The art of endgame play is how to achieve your plan and subdue the opponent at the same time. And this book is here to help you understand it!

# THE GOLDEN RULES OF THE ENDGAME

The endgame is the moment of truth. It is the phase of the game where we will try to reap the seeds of our effort regardless of whether that is the full point of victory or the half point of the draw.

The significance of errors increases in the endgame as the opportunities for correcting them are few.

The following rules are considered Golden Rules of the Endgame. They were recorded by GMs **Reuben Fine** and **Pal Benko**, two of the world's greatest experts in this field:

1. Start thinking about the endgame in the middlegame.
2. Somebody usually gets the better deal in every exchange.
3. The king is a strong piece: Use it!
4. If you are one or two pawns ahead, exchange pieces but not pawns.
5. If you are one or two pawns behind, exchange pawns but not pieces.
6. If you have an advantage do not leave all the pawns on one side.
7. A distant passed pawn is half the victory.
8. Passed pawns should be advanced as rapidly as possible.
9. Doubled, isolated and blockaded pawns are weak: Avoid them!
10. The easiest endings to win are pure pawn endings.
11. Passed pawns should be blockaded by the king.
12. The only piece that is not harmed by watching a pawn is the knight.
13. Two bishops vs bishop and knight constitute a tangible advantage.
14. Bishops are better than knights in all except blocked pawn positions.
15. Do not place your pawns on the color of your bishop.
16. The easiest endings to draw are those with bishops of opposite colors.
17. Rooks belong behind passed pawns.
18. A rook on the seventh rank is sufficient compensation for a pawn.
19. Not all rook endings are drawn!
20. Perpetual check looms in all queen endings.
21. Every move in the endgame is of the utmost importance because you are closer to the moment of truth.

Of course, there are plenty of other guidelines for dealing with the end-game:

1. Activate you king.
2. If you have more pawns than your opponent then exchange pieces not pawns.
3. If you have fewer pawns than your opponent exchange pawns not pieces.
4. Try to create a passed pawn.
5. Protected passed pawns are very strong.
6. Outside protected passed pawns are usually decisive.
7. Try to promote a passed pawn.
8. If your opponent has a passed pawn, try to blockade that pawn.
9. Bishops are generally stronger than knights.
10. Bishops of opposite color increase the chances of a draw.
11. Be aggressive with your rooks. If your choice is between defense and counterattack, always counterattack.
12. Rooks belong behind passed pawns.
13. Know the basics.

# ROOK ENDGAME PRINCIPLES

There are five basic principles that must be followed faithfully in rook endings:

1. **Rook behind the pawn:** The placement of the rooks in relation to the pawns is very significant. The rook must be placed behind the pawn whether the pawn is yours or not. With every move the pawn makes the radius of our rook will increase and that of the opponent's will decrease.

2. **Active rook:** In all rook endings the active handling of the rook is almost always the indicated course of action. The initiative and attacking possibilities must always figure in our plans and moves.

3. **Active king:** As in all endings the active king has the first say as the endgame is its finest hour. This is especially true when the king can cooperate harmoniously with the rook as it can dynamically help us solve the problems posed by the position.

4. **Planning:** Our moves must be part of one or more plans. Active

plans must be directed towards the sector of the board where we are superior and, correspondingly, defensive plans must be directed towards the area where we are inferior.

5. **Combination of all the above:** When we can combine the above-mentioned elements then we will be able to extract the maximum from our position!

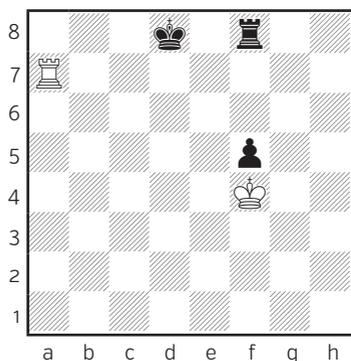
Mark Dvoretsky makes a general quote: Rook activity is the cornerstone in the evaluation and play of rook endings.

This activity may take diverse forms: from attacking the enemy pawns, to the support of one's own passed pawns, to the interdiction or pursuit of the enemy king.

There are indeed times when the rook must remain passive and implement purely defensive functions. But even then, one must stubbornly seek out any possibility of activating the rook, not even stopping at sacrificing pawns, or making your own king's position worse.'

### Study 1

Nikolay Nikolaev Minev  
Shakhmatna Misal 1972 ○



This looks like an easy draw for White as the extra black f-pawn is going nowhere. But a closer examination shows that White can get more than a draw.

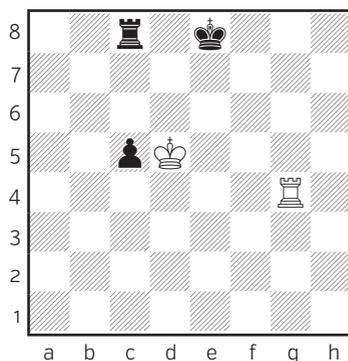
1. ♖e5!

And White wins. For example 1... ♜e8+ 2. ♖d6!+- or 1... f4 2. ♖e6!+- and Black loses the rook. An excellent example of the importance of piece placement and activity.

1-0

### Study 2

Studenetsky  
Shakmaty v SSSR 1939 ○



1. ♜g8+ ♖d7 2. ♜g7+ ♖e8 3. ♜h7! c4  
4. ♖d6 ♜d8+ 5. ♖e6

1-0