

[Home](#) * [Engines](#) * **Hannibal**



Hannibal crossing the Alps ^[4]

Hannibal,

an [UCI](#) compliant chess engine developed by [Sam Hamilton](#) and [Edsel Apostol](#), supported by [Audy Arandela](#) in [testing](#) and maintaining the [opening book](#). They share the common goal to make Hannibal as strong as possible. As of now, they are working on the [tactical](#) weakness, due to Edsel's non-conventional aggressive [pruning](#) methods, and the holes in the [evaluation function](#) ^[1]. Edsel will be working on [SMP search](#) ^[2], while Sam will be in charge of writing code to [tune the parameters automatically](#).

Hannibal incorporates ideas from their authors earlier engines [LearningLemming](#) and [Twisted Logic](#). It uses [alpha-beta](#), enhanced with various chess specific heuristics, and relies on a very [selective search](#), [endgame knowledge](#), and an understanding of [material](#) imbalances ^[3]. [Bitboards](#) are the basic data structure used to represent the board and to [generate moves](#).

Table of Contents

[Etymology](#)

[Tournaments](#)

[Selected Games](#)

[See also](#)

[Forum Posts](#)

[2010 ...](#)

[2015 ...](#)

[External Links](#)

[Chess Engine](#)

[Misc](#)

[References](#)

[What links here?](#)

Etymology

Hannibal, from [Phoenician](#) hann - "grace" and baal - "master" or "lord", meaning "mercy of (the god) [Ba'al](#)" ^[5], was a [Carthaginian](#) general who fought the [Roman Republic](#) in the [Second Punic War](#).

Tournaments

So far, Hannibal played the [CCT12](#), [WCRCC 2010](#), [WCRCC 2011](#), and the [ACCA 2011 online tournaments](#).

Selected Games

[CCT12](#), round 5, [Hannibal](#) - [Shredder](#) ^[6]

```
[Event "CCT12"]
[Site "FICS"]
[Date "2010.02.20"]
[Round "5"]
[White "Hannibal"]
[Black "Shredder"]
[Result "1/2-1/2"]
```

```
1.e4 e5 2.Nf3 Nc6 3.Bb5 a6 4.Ba4 Nf6 5.O-O
O d6 6.Re1 Be7 7.c3 Bd7 8.d4 O-O
```

9.Nbd2 exd4 10.cxd4 Nb4 11.Bxd7 Qxd7 12.Qb3 a5 13.a3 Na6 14.Qc2 h6 15.Nc4
a4 16.Bd2 d5 17.exd5 Nxd5 18.b3 c5 19.bxa4 cxd4 20.Nce5 Qc7 21.Qe4 Qd8
22.Qg4 Nc5 23.Bxh6 Bf6 24.Rac1 Nc3 25.Bg5 Rxa4 26.Bxf6 Qxf6 27.Nxd4 Rd
8
28.Rxc3 Raxd4 29.Qh5 Re4 30.Rce3 Rxe3 31.Rxe3 Qf5 32.g4 Qxh5 33.gxh5 R
d5
34.Nc4 Rg5+ 35.Kh1 Rxh5 36.Re8+ Kh7 37.Nd6 Kg6 38.Re7 Rh3 39.Rxf7 Rd3
40.Rc7
Ne6 41.Rd7 Kh5 42.h4 Kg4 43.Nf7 Rxd7 44.Ne5+ Kxh4 45.Nxd7 Nf4 46.Nc5 b
6
47.Nb3 Nd3 48.Kg2 Kg4 49.a4 Kf4 50.a5 bxa5 51.Nxa5 Ke4 1/2-1/2

See also

- [Elephant](#)
- [LearningLemming](#)
- [Legend](#)
- [Twisted Logic](#)

Forum Posts

2010 ...

- [Twisted Logic 20100131x](#) by [Edsel Apostol](#), [CCC](#), February 02, 2010
- [Hannibal 1.0](#) by [Edsel Apostol](#), [CCC](#), July 17, 2010
- [WCRCC 2010 - Hannibal games](#) by [Sam Hamilton](#), [CCC](#), July 17, 2010 » [WCRCC 2010](#)
- [To Ed: Hannibal 1.0a ... Twisted Logic!](#) by [Frank Quisinsky](#), [CCC](#), July 20, 2010
- [Hannibal opening book](#) by [Audy Arandela](#), [CCC](#), July 21, 2010
- [Xmas SWCR gift: Booot won vs. Hannibal with 3 knights!](#) by [Frank Quisinsky](#), [CCC](#), December 21, 2010 » [Booot](#)
- [Gaviota - Hannibal 5th round \(great Hannibal game, watch it\)](#) by [Miguel A. Ballicora](#), [CCC](#), July 23, 2011
- [Reducing/Pruning Bad Captures \(SEE < 0\)](#) by [Edsel Apostol](#), [CCC](#), August 19, 2011 » [Pruning, Reductions, Captures, SEE](#)
- [Hey Sam: Hannibal and obvious move heuristic](#) by [Charles Roberson](#), [CCC](#), November 29, 2011
- [SMP and questions](#) by [Edsel Apostol](#), [CCC](#), November 23, 2012 » [Parallel Search](#)
- [Hannibal 1.3 SMP](#) by [Edsel Apostol](#), [CCC](#), December 31, 2012

2015 ...

- [Hannibal 1.5 release](#) by [Sam Hamilton](#), [CCC](#), January 28, 2015
- [Hannibal 1.5 bug](#) by [Carl Langan](#), [CCC](#), July 31, 2015

- [Hannibal 1.7](#) by [Edsel Apostol](#), [CCC](#), August 09, 2016

External Links

Chess Engine

- [Hannibal - Chess Engine Portal](#)
- [Computerschach, Interview with Edsel Apostol](#) by [Frank Quisinsky](#), February 25, 2010
- [Hannibal 1.2 64-bit](#) from [CCRL 40/40](#)

Misc

- [Hannibal \(disambiguation\)](#) from [Wikipedia](#)
- [Hannibal](#) from [Wikipedia](#)
- [2152 Hannibal](#) from [Wikipedia](#)
- [Hannibal, Missouri](#) from [Wikipedia](#)
- [Hannibal, New York](#) from [Wikipedia](#)
- [Hannibal Lecter](#) from [Wikipedia](#)
- [Hannibal \(high-rise building\)](#) from [Wikipedia](#)
- [Miles Davis](#) - Hannibal ^[7], 1988, [YouTube](#) Video
feat. [Kenny Garrett](#), [Bobby Irving](#), [Adam Holzman](#), [Benjamin Rietveld](#), [Joe "Foley" McCreary](#),
[Marilyn Mazur](#), [Ricky Wellman](#)

References

1. [^] [Computerschach, Interview with Edsel Apostol](#) by [Frank Quisinsky](#), February 25, 2010
2. [^] [SMP and questions](#) by [Edsel Apostol](#), [CCC](#), November 23, 2012
3. [^] [Hannibal - Chess Engine Portal](#)
4. [^] Hannibal's celebrated feat in crossing the [Alps](#) with [war elephants](#) passed into European legend: detail of a fresco by [Jacopo Ripanda](#), ca. 1510, [Capitoline Museums](#), [Rome](#), [Hannibal from Wikipedia](#).
5. [^] [Hannibal - Wiktionary](#)
6. [^] [CCT-12-Hannibal games](#) hosted by [Schachwelt](#), [Computerschach, Interview with Edsel Apostol](#) by [Frank Quisinsky](#), February 25, 2010
7. [^] This is actually [The Senate / Me & You](#)

What links here?

Page

[ACCA 2011](#)

[CCT12](#)

[CCT15](#)

[Edsel Apostol](#)

Date Edited

Jul 14, 2014

Jan 28, 2018

Oct 21, 2014

Nov 2, 2016

Page	Date Edited
Elephant	Sep 19, 2016
Engine releases	Apr 23, 2018
Engines	Mar 10, 2018
Hannibal	Oct 4, 2017
LearningLemming	Jun 29, 2013
Nebula	Feb 7, 2015
Parallel Search	Dec 30, 2017
PT 47	Dec 1, 2014
Sam Hamilton	Jan 28, 2015
SMP	Dec 26, 2017
TCEC Season 10	Jan 3, 2018
TCEC Season 11	Apr 18, 2018
TCEC Season 5	Jun 2, 2014
TCEC Season 6	Dec 2, 2014
TCEC Season 7	Jan 23, 2015
TCEC Season 8	Nov 30, 2015
TCEC Season 9	Nov 6, 2017
Twisted Logic	Nov 23, 2012
WCRCC 2010	Jul 14, 2014
WCRCC 2011	Oct 21, 2014
WCRCC 2015	Jul 19, 2015

[Up one Level](#)