

## TABLE OF CONTENTS

Table of Contents .....	129
Revolution (H.J. van den Herik) .....	129
Farewell Martine Tiessen (H.J. van den Herik).....	130
The Effect of Hash Signature Collisions in a Chess Program (R.M. Hyatt and A. Cozzie).....	131
The Nature of Retrograde Analysis for Chinese Chess – Part 2 (H-r. Fang).....	140
Notes: 6-Man Chess Solved (G.M <sup>c</sup> C. Haworth).....	153
Using Joseki for Tactics Deployment in Computer Go (C-C. Li and H. Koh) .....	154
Review: .....	159
P. Spronck: Adaptive Game AI (D. Hartmann) .....	159
Information for Contributors.....	161
News, Information, Tournaments, and Reports:.....	162
The 13 <sup>th</sup> World Computer-Chess Championship (Y. Björnsson and H.J. van den Herik).....	162
Two More Titles .....	173
The World Speed Chess Championship.....	173
The Fischer Random Chess Tournament .....	173
Hardware Overview.....	175
Minutes of the ICGA Triennial Meeting (H. Iida).....	176
The 10 <sup>th</sup> Computer Olympiad (H.J. van den Herik and J.W. Hellemons) .....	177
HANDTALK III wins 19 x 19 Go Tournament (S-J. Yen and Jr-C. Chen) .....	178
GO INTELLECT wins 9 x 9 Go Tournament (S-J. Yen and J-C. Yan) .....	180
XQMASTER wins Chinese Chess Tournament (Jr-C. Chen).....	182
8QP wins Amazons Tournament (R. Lorentz).....	185
TACOS wins Shogi Tournament (Y. Hashimoto) .....	187
MILA wins Clobber Tournament (J. Willemson and M. Winands) .....	188
UOFA wins Pool Tournament (M. Greenspan).....	191
DEEP BEIGE wins Dots and Boxes Tournament (M. Bochenski).....	194
The 11 <sup>th</sup> Advances in Computer-Games Conference (F. Niemela).....	195
The 2005 World Computer-Go Congress (S-J. Yen and S-C. Hsu) .....	196
Calendar of Computer-Games Events in 2005-2006.....	198
The Swedish Rating List (T. Karlsson).....	199
How the ICGA Journal Reaches You.....	200

## REVOLUTION

There are three types of revolution, next to the social-political revolution: the industrial revolution, the cultural revolution, and the technological revolution. Each revolution has its own characteristics, its own type of leaders, and its own momentum. Sometimes the revolution is a logical consequence of a development, but in an extreme case it is an instantaneous, unexpected event. One could say: it is revolution, now!

In August 2005, Reykjavik was the scene of a revolution of the type: now! It was unexpected, undisputed, and convincing. When Yngvi Björnsson submitted his plans for organizing the 13<sup>th</sup> World Computer-Chess Championship in Reykjavik, no hints existed that the 10-year standing hegemony of JUNIOR and SHREDDER would end. The only hope one could have for a change was based on the program HYDRA that had outclassed IGM Adams (in June 2005).

However, the HYDRA team decided in the end not to participate and so the general feeling was that one should witness another exciting but well-known battle between JUNIOR and SHREDDER. In Reykjavik this “top match” was scheduled for the last round of an 11-round all-play-all tournament.

The flow of the tournament was breathtaking. Two new programs took over the supremacy of the *ancient régime*. They scored point after point and finished first (ZAPPA) and second (FRUIT). For the chess players it was a cultural revolution, for the computer-chess specialists it was a technological revolution, and for computer chess companies, it was an industrial revolution.

Who are the new leaders? The answer is: Anthony Cozzie and Fabian Letouzey. And what are their secrets? It is hard to tell since computer-chess specialists are not used to reveal their findings. Yet, the designer of the new World Champion program, Anthony Cozzie, is a co-author (together with Bob Hyatt) of the article *The Effect of Hash Signature Collisions in a Chess Program*, published in this issue. Although it does not deepen our insights into his ideas implemented in ZAPPA, it shows his way of working and examining problems that many programmers have faced in the past. The contribution may be small, but their provisional conclusion points to a definitive end of the discussion in which uncertainty had the upper hand for several years.

The Reykjavik contribution is much larger. ZAPPA scored 10.5 out of 11 games. It is an unprecedented result. Moreover, everyone who replays ZAPPA's games will admit that all the wins are deserved. ZAPPA was in a class on its own; two classes above JUNIOR and SHREDDER, one class above FRUIT.

For Fabian Letouzey, it must have been a remarkable tournament. He might have hoped to play the role that Anthony Cozzie now took, since he had assembled a very good chess-playing program that was composed from open-source software. Letouzey studied all the computer-chess techniques, dug up code on the Internet, and used his talents to integrate these pieces into an efficient program. After he had tested it against many (not to say all) available software programs, Letouzey came to Reykjavik with high expectations.

In Spanish and Latin-American nations, some revolutions are proclaimed by "pronunciamientos", but the new leaders mentioned above came from France and the USA. They did not announce in advance how strong they believed their programs were; they simply played. Up to round six, nobody noticed that the ZAPPA (4.5 out of 5) and FRUIT (3.5 out of 5) were exceptionally strong. They were good and scored well. But all of a sudden it became clear to JUNIOR and SHREDDER, and to all the others, that ZAPPA and FRUIT were involved in a *coup d'état*. ZAPPA turned out to be the new leader with a score of 10.5 out of 11. For more details of this exciting tournament we refer the reader to the tournament report (pp. 162-175).

Next to this report, we see progress from Asia in the scientific part and in the tournament part, albeit that we do not indicate this progress with the term revolution. Dr. Fang continues the reporting of the infallible construction of his Chinese-Chess databases and their play, whereas Haworth notes in a one-pager that in chess the 6-man games are solved.

The computer Olympiad in Taiwan together with the ACG11 Conference is the other important event that is reported in this issue. We see much interest in Asian games, such as Chinese Chess, Go, and Shogi.

All in all, we believe that the world of Games is in a fascinating stage of new developments. This Journal aims at informing you in the right time on the right developments and the thrilling revolution.

Jaap van den Herik

#### Farewell Martine Tiessen

Since September 1999, the Editor-in-Chief has been supported by Mrs. Martine Tiessen. Over the past six years she has served the ICGA (and previously the ICCA) in numerous ways: as Editorial Assistant, as Editorial Manager, and as a Member of the organisation committees of five Computer Olympiads and four Computer-Chess World Championships. Moreover, she was editorial manager for many books produced within the framework of our research (ACG9, ACG10, CG98, and AI and Games). In all her roles, she has been a source of inspiration and motivation for both the editors and the contributors. As of October 1, 2005, she will leave our institute (IKAT) to accept the challenge of being a teacher at the Vocational Training Institute in Sittard, The Netherlands.

The Editorial Board wish to thank her for her ongoing drive which has encouraged so many authors and which has helped the ICGA Journal to arrive at the front-ranked position it nowadays has in the World of Games. Martine, we thank you for all your effort and are assured that our readership will concur in our gratitude. Moreover, the ICGA readership and its editors wish you all the best in your new function.

Jaap van den Herik