



**OPERATIONS RESEARCH SOCIETY OF SOUTH AFRICA
OPERASIONELE NAVORSINGSVERENIGING VAN SUID-AFRIKA**

**MINUTES OF THE ANNUAL GENERAL MEETING HELD AT THE
ABSA CONFERENCE CENTRE, PRETORIA, ON 8 SEPTEMBER 2003**

Present:

H Borthma	R Cruywagen	JD de Kock	HC de Kock	I du Plooy
TJ Evert	LP Fatti	WR Gevers	J Greben	MFP Harmse
H W Ittmann	R Koen	HA Kruger	PH Kruger	J le Roux
JP Luhandjula	O Ncube	PD Pretorius	MLMA Setshedi	TJ Stewart
M Strydom	T Stylianides	LD Tomé	FE van Dyk	WA van Hoepen
J JvRensburg	G Venter	EHA Venter	SE Visagie	GJ Wessels
K Wolfaardt	VSS Yadavalli			

Proxies:

PduT Fourie David Masterson

Apologies:

P Bothma	M Fick	P du T Fourie	G Kletz	K Koch
D Masterson	I Niewoudt	M Turpin	JH van Vuuren	

1. WELCOME:

Hans Ittmann welcomed everyone present.

2. APPROVAL OF MINUTES: 10 SEPTEMBER 2002

The minutes were approved.

Proposer: Stephan Visagie

Seconder: Wim Gevers

3. MATTERS ARISING

None

4. PRESIDENT'S REPORT

See attached report. Hans Ittmann gave an overview of the report and it was accepted.

Proposer: Wim Gevers Seconder: Kobus Wolfaardt

A special vote of thanks to Elise de Beer for preparing the financial statements for the past two years free of charge. Thanks also to Anton de Villiers for arranging the student competition.

Hans congratulated the following people:

- Leo Tome, for the new look Newsletter
- Jan van Vuuren, Isabelle Nieuwoudt and Morné Pistorius for the new look ORSSA website
- Kobus Wolfaardt and Rene Fossati on winning the Tom Rozwadowski medal.
- Joel Lejaha, BSc Honours student from the University of the Witwatersrand and Wim van Schalkwyk, final year Industrial Engineering student from the University of Pretoria on winning the student competition.

The people in East Africa need support to get their OR activities going and to learn more about OR. They would appreciate books and electronic material.

5. FINANCIAL REPORT

See attached report. All IFORS and EURO subscriptions are now up to date. The report was accepted.

Proposer: Gys Wessels Seconder: Wim Gevers

6. EDITORS' REPORT

6.1 Newsletter

To cover the rising cost Leo found advertisers for the newsletter. There is a lack of critical mass, and therefore economies of scale, in the Society. It costs R5600 to publish one newsletter and then an additional R170 for every 50 additional copies. He is planning to increase the number of issues from 3 to 4 next year. Please give details of potential advertisers to Leo.

Leo is trying to publish an industry article in every newsletter and hopes that this will help to market the Society and OR. He is also including the membership form in the newsletter.

There is a lack of involvement from members of the Society. No entries were received for the MCDA book prize. Kluwer has agreed to sponsor books for review and more prizes.

6.2 ORiON

Two articles have been accepted and two more are being revised for Volume 18, hopefully to be published fairly soon. There are another 10 articles in the pipeline, which should be enough for at least another Volume. Paul will try to chase the referees and speed up the process during his last term. He wishes the incoming editor all the best. Thanks to Paul for all the hard work.

7. CHAPTER REPORTS

7.1 JOHANNESBURG

Esbeth van Dyk read the report that was received from Dave Evans. See attached.

7.2 PRETORIA

Gys Wessels gave an overview of the chapter's activities. The Pretoria chapter organised a Valentine's dinner, which was also attended by the Johannesburg chapter. The speakers were Dewald Rhode and Hans Ittmann. The Pretoria chapter also hosted this year's ORSSA conference.

7.3 KWAZULU-NATAL

The chapter has been dormant since Kathryn resigned from the University of Natal.

7.4 VAAL TRIANGLE

Marthi Harmse gave an overview of the chapter's activities. See report attached.

7.5 WESTERN CAPE

Wim Gevers gave an overview of the chapter's activities on behalf of Jan van Vuuren who is overseas on sabbatical. See Jan's report attached.

8. EURO, IFORS AND OTHER LINKS

8.1 ORDA-1 (East African group):

The ORDA conference, supported by EURO, will be held in Nairobi from 17-19 September. A preliminary programme is being put together. In Burkino-Faso the programme was dynamic – it changed every day. It takes effort to get activities going in that region, 147 delegates, mostly from Kenya, are expected to attend. Hans will report back in the Newsletter.

8.2 EURO 2006:

EURO 2004 will take place in Rhodos, Greece.

In 2005 there will be no EURO conference as the IFORS conference will be held in Hawaii.

EURO 2006 will be held in Reykjavik, Iceland.

8.3 Nomination for the Euro Gold Medal 2004

EURO asked Theo Stewart, our EURO representative, if we would support their nomination of Mordechai Avriel. He wrote book on NLP and is currently very involved in the financial sector. He was in South Africa in 1974 when we had the SA-Israel OR conference.

8.4 IFORS

Congratulations to Theo Stewart for being elected as the IFORS Vice-President-at-large.

SA, Italy and India submitted bids to host IFORS 2008. These have been sent to all the member societies to vote for one of the three locations. It will probably be couple of months before we hear the outcome.

We have received the revised IFORS Statutes. Paul Fatti has signed it on behalf of ORSSA.

9. INCREASE IN MEMBERSHIP FEES

A notice, containing a motivation for an increase in membership fees as well as a low and a high increase scenario, was sent out to members 30 days in advance of the AGM. This is in line with the stipulations in the ORSSA constitution for changing membership fees.

The Exec proposed to go for the high increase to make sure that the Society is financially sound. The high increase corresponds to an annual increase of about 12%. The new fees would be: R250

for full members, £35 or \$55 (approx R400) for foreign members, R40 for students and R600 for corporate members. Life and honorary members to not pay fees.

The proposal was accepted unanimously

Proposed: Theo Stewart

Seconder: Ilze du Plooy

Members who have already paid their fees for the next year won't be asked to pay in the difference.

10. ORSSA 2004

The Western Cape chapter will host ORSSA 2004. The conference will be held at the University of Stellenbosch Business School in Bellville (Cape Town) from 5-8 September 2004.

11. ELECTION OF EXECUTIVE COMMITTEE FOR 2003/2004

The following members were elected unanimously:

President	Wim Gevers
Past/Vice president	Hans Ittmann
Secretary:	Esbeth van Dyk
Treasurer:	Theo Stylianides
Newsletter editor:	Leo Tomé
ORiON editor:	Jan van Vuuren
Webmaster	Isabelle Nieuwoudt
Additional members	Trinette Evert
	Theo Stewart
	Stephan Visagie

13. GENERAL

There was a request for ORiON to be published electronically in addition to the paper copy as this is free of charge.

Hans thanked the members of the Exec for their support over the last two years and for doing a good job to get the society to be run professionally.

Wim thanked Hans for taking on the presidency for the 2nd time when the president elect emigrated.

Johannesburg Chapter Chairman's Report: Sept 2003

By Dave Evans

The past year has been another relatively quiet one for the Chapter.

The "Gauteng" annual dinner was a Valentine's Day event this year, arranged by the Pretoria Chapter and supported by several Johannesburg couples. Full marks and thanks to the Pretoria Chapter for a very pleasant evening, excellent speakers (Dewald Rhode and Hans Ittmann) marred only by the minor inconvenience of what sounded like a herd of elephants moving furniture immediately above our heads for large parts of the evening.

Committee member Neil Manson is on the faculty of the Roodepoort campus of Monash University and arranged a seminar presented by Ann Nicholson, visiting from their Australian parent university, on Knowledge Engineering for Bayesian Networks. The Monash campus also hosted the seminar, attended by some 15 Society and University members, and also provided refreshments. Many thanks to Neil and Monash for a very interesting and enjoyable evening.

Another schools afternoon will take place the week after the Conference – scheduling problems with the various government and private school timetables have resulted in it being rather later this year than last. Particular thanks to Paul Fatti and Derek Saunderson for the organising of this.

The St Stithian's "Maths Experience" in October last year, to which the Chapter made a significant input, went very well, although it eventually devolved totally onto the shoulders of Paul Fatti, who coped superbly. He gave the assembled top Joburg mathematical Grade 11 and 12 pupils a very interesting and interactive overview of practical OR – several of them would have acquitted themselves with honour in one of the original OR projects – the Enigma code breakers of World War 2, as one of the exercises Paul set them involved just that. I owe him a particular vote of thanks, as I had to cancel my participation at the last minute and he took over my contribution with aplomb.

A final meeting of the year and cocktail party is planned for November.

We have had the usual very variable attendance at committee meetings – I don't think the whole committee has made a single meeting since the agm, although that is not criticism; we are all heavily committed in our other "paying" activities, and I appreciate the time they can give us. It seems to be the way of the world these days that a very significant part of the community would love to be employed, whilst those of us who are, seem to be working routine 12 hour days. A big thank-you to them all for their contributions – vice chairman Paul Fatti, Secretary Stephen Sharpe, Treasurer Derek Saunderson, and members Jeff Tyler, Neil Manson and Rory Hunkin. I have found my own time available to the Chapter less than I would ideally like to be able to offer, and as seems to be one of my recurring theme songs, if there are other Joburg Chapter members who would like to be involved, please contact me on 082-554-8633, or dave@valueanalytics.co.za .

Operational Research Society of South Africa Vaal Triangle Chapter

Annual Report 2002/2003

When I accepted the responsibilities of chapter chairperson in September 2002, the Vaal Triangle chapter of the Operational Research Society of South Africa (ORSSA) was dormant. In order to revive the chapter, the main objective for 2003 was to raise awareness concerning Operations Research in the Vaal Triangle.

In order to explore commonalities, it was decided to join forces with the Vaal Triangle chapter of the South African Institute for Industrial Engineering (SAIIE), which was also dormant at the time. In order to attract interest from the industry, the meeting place would be at Sasol I in Sasolburg on Wednesday afternoons at 16:00. The main objective being to raise awareness, all meetings are free of charge. Four symposia were arranged for 2003:

1. Spreadsheet-based OR : Trojan Horse or Achilles Heel

Paul Kruger of the Department: Industrial Engineering at the University of Pretoria made the first highly entertaining presentation on 23 April 2003. More than twenty people from industry and academic institutions attended.

2. Stochastic modelling in the Petrochemical industry – an example

Marlize Meyer from Modelling Development and Application Services at Sasol Technology Information Management made the second presentation on 4 June 2003. More than thirty people from industry and academic institutions attended.

3. The joys of OR

Dries de Wet, head of the Basel Credit Risk Project at ABSA, made the third presentation on 27 August 2003 and again about thirty people from industry and academic institutions attended.

4. OR and Industrial Engineering

The president of SAIIE, David Crewe-Brown, will make the fourth presentation at our year-end function during November 2003. Separate annual general meetings will be scheduled for both societies at this occasion.

The objective of raising awareness is achieved. People from different disciplines attend from all over Gauteng, North West, Mpumalanga and the Free State. Lively discussions are held during interactive presentations and thereafter while having something to eat and drink. Due to demand, presentations were already loaded onto the intranet of Sasol and are in the process of being loaded onto the websites of the societies. Articles were written for internal Sasol publications and the publications of the societies although it took long to get the necessary approval – it should take less time in future. After the symposia, some attendees started doing OR type of work themselves or commissioned it. Interactions were established between different organisations and between industry and academics. The chapter was involved with restructuring the OR course in the Department: Information Systems at the Vaal Triangle Technikon.

The main objective for 2004 will be to establish sustainability in terms of members and funding.

The Vaal Triangle chapter of ORSSA would like to thank the president, Hans Ittmann, for his support. We would also like to thank Sasol Technology Information Management for generously sponsoring the above events. The secretary of the Modelling Development and Application Services group, Chrisma Pieterse, is also thanked for the excellent way she arranged the events.



Marthi Harmse
Chairperson

Chapter Report: October 2002-September 2003

Western Cape Chapter of ORSSA

By *Jan van Vuuren*

The 2002/2003 year has been another eventful one for the Western Cape Chapter of ORSSA. In November 2002 the 2001-elected executive was re-elected for a second term of office. The executive elected, consists of

1. Jan van Vuuren (chairperson)
2. Wim Gevers (vice-chairperson)
3. Theo Stewart (treasurer)
4. Isabelle Nieuwoudt (secretary)
5. Trevor Wegner (additional member)

The election of the executive coincided with the last chapter meeting of the 2002 calendar year, which was the annual student competition, held at the University of Stellenbosch Business School, in Bellville. This competition is held every year, with the objective of finding the best OR project (roughly on honours or 4th year level) by a student at any tertiary institution in the Western Cape. The winner is usually automatically entered into the annual national student competition of the Society during the following year. Two student teams took part in the chapter competition during 2002 were:

1. Eltdon de Waal (an honours student from UCT) on a project entitled "Portfolio Optimisation - Examining Resampling Efficiency and Portfolio Confidence Intervals," and
2. Chris Human, Leo Tome, Amanuel Ghebretsadik & Debessay Kassa (all honours students from Stellenbosch University), on a project entitled "Determining optimal stock reorder levels at ClickaBox Factory."

The adjudicators for the competition were Wim Gevers, Theo Stewart and Esbeth van Dyk. The judges commended both teams for their good written work and interesting oral presentations, and awarded the prize to Eltdon de Waal, who received a year's free student membership to ORSSA and was subsequently nominated as the official chapter entry in the national student competition this year. The combined AGM and Chapter Student Competition concluded with a delightful cocktail party, organised by the University of Stellenbosch Business School.

Three seminars were organised by the chapter during the first semester of 2003. The first seminar, on March 12th, was given at UCT by Juwa Nyirenda of the Department of Statistical Sciences at UCT. In this fascinating talk a new "slice and squeeze" algorithm for solving mixed integer programming problems was proposed and illustrated by means of example. A lively discussion about the complexity of the proposed algorithm took place afterwards. The second seminar, entitled "A genetic algorithm approach to multi-objective land use planning," took place on April 16th, 2003 at the Department of Applied Mathematics, at Stellenbosch University. In this interesting talk Theo Stewart of the Department of Statistical Sciences at UCT shared with the audience some of the work done abroad during his sabbatical leave in 2002, in which land utilisation in a Dutch city was optimised according to different criteria, including industrial development potential, recreation value, conservation requirements, and many more. The third seminar was delivered by Darin Kent and Eva Neves, two employees of PIC Solutions, at UCT on May 28th, 2003. In this very well prepared and informative talk the speakers outlined the use of various OR techniques (such as neural networks and goal programming) in use at PIC solutions within their credit scoring

system. There were a number of students present at the talk, who were clearly interested in the work done by PIC Solutions, and at least two of these students were offered jobs at PIC Solutions, starting January 1st, 2004, as a direct consequence of the links forged during this seminar.

A fourth seminar is planned for October 1st, 2003, in which Esbeth van Dyk of the CSIR and Frank Ortman of the Department of Applied Mathematics at Stellenbosch University will talk about modelling infrastructure capacity for the South African Fruit Industry. This talk will be held in Stellenbosch.

The 2003 Western Cape student competition will be held at the University of Stellenbosch Business School in Bellville on Wednesday November 12th. Supervisors are invited to nominate OR-related project work by their honours students for this competition, by contacting Isabelle Nieuwoudt at the Department of Applied Mathematics, at Stellenbosch University. This student competition will again be combined with the chapter AGM, followed by a cocktail party. All chapter members are most welcome to attend.

Any suggestions as to possible activities for the Western Cape Chapter during 2004 will be appreciated. Please contact Jan van Vuuren at the Department of Applied Mathematics, at Stellenbosch University if you have any suggestions.



Jan van Vuuren, *chapter chair*
September 7th, 2003