# SILVER JUBILEE 25 years of IAWPRC

A quarter of a century on from its founding, IAWPRC is celebrating its silver jubilee; 25 years of exchanging information and ideas around the world on how to improve water treatment and cut down the ravages of pollution on water bodies. Definition of the word jubilee, gives it as "an occasion for jubilation, a time during which special indulgences are granted", and this is what this anniversary issue of WQI seeks to commemorate.

In the sections which follow, IAWPRC wants all of its members to share in the jubilation of its first, successful 25 years. The columns below show how the Association has grown and evolved, and some of the people who have worked to help it become a thriving volunteer organization, respected throughout the world. But these pages are not just indulging in a look backwards. There is a great deal of forward thinking - from current president Poul Harremoës, and from IAWPRC's AD 2000 task group on the pollution problems yet to come and what IAWPRC's future role should be.

# In the beginning . . .

"With rare discretion and warm sense of history, the first International Conference on Water Pollution Research meets in London, England. Here the degradation of a great river first became urgent of solution; and here, too, workable answers sprang from the minds of notable engineers and public officials".

With these words, Prof Gordon Fair of Harvard University began his keynote address at the world's first international conference on water pollution research at Church House, Westminster, London on 3 September 1962. By the end of the conference the UK journal *Municipal Engineering* was able to report that "the delegates were unanimous that (the conference) had shown that considerable economies could be made in perfecting the technique of water quality management if researchers working along parallel lines in different countries

were given the opportunity to pool their information". The delegates were also in complete agreement for a second conference, which was held in Tokyo, Japan, in 1964. It was at this time that the seeds were sown for an association which eventually became IAWPRC.

During the London conference a steering committee was set up to investigate the feasibility of founding an international association to deal with water pollution research. At an historic meeting in Harrogate on 26 June 1965 the steering committee formally adopted the constitution of the new International Association on Water Pollution Research. The rest, as they say, is history.

Today, IAWPRC is a thriving membership organization. Its main strands of activities are its conferences, publications and specialist groups. Principal benchmarks in the development of each of these are given below.

### Milestones along the way

1962 First biennial conference held

1965 IAWPR formally established. Prof Erman Pearson elected first president

1967 Water Research journal launched

1969 Dr Gerrie Stander becomes president

1971 September, Vienna, first specialised conference held on Large Treatment Plants

1972 Progress in Water Technology journal launched

1975 First full time Secretariat established in London, with Ronald Fairall as Secretary-Treasurer (jointly with IWSA)

1976 Mr Bertil Hawerman becomes president

1980 Formation of first specialist group - Water Virology Prof Richard Engelbrecht becomes president

1981 Progress in Water Technology becomes Water Science and Technology

Tony Milburn becomes first full-time Executive Director

1982 Association changes its name to International Association
on Water Pollution Research and Control (IAWPRC)

1984 Advances in Water Pollution Control book series launched

1985 First regional conference - Asian Pacific region, Tokyo Headquarters moved to Queen Anne's Gate New style Yearbook launched

1986 First biennial in a developing country held in Rio de Janeiro, Brazil
Prof Poul Harremoës becomes president
New constitution formally adopted

1987 Water Quality International magazine launched Scientific and Technical Reports series launched

1988 New style biennial conference programme inaugurated, Brighton, UK

1990 25th Anniversary

#### It's the members that count

From modest beginnings in 1965, membership has grown steadily, reaching its 2000th member by the end of the 80s. Since the beginning of 1990, the growth pattern has accelerated, with new members now coming in at 75 per month. By the end of the year, the total should pass 3000. In the next 4-5 years the total should comfortably exceed 5000, and will probably be closer to 6000.

Not that this is simply a numbers game. Interest in water pollution control worldwide has never been greater. People everywhere, alarmed at environmental degradation, have galvanized governments into major spending programmes to clean up the aquatic environment. These programmes will need the best available expertise to get maximum value for money. IAWPRC can provide this, with its global network of contacts, and growing membership.

### **Group theory**

Specialist Groups have been the main IAWPRC success story of the 1980s. From the founding of the first group, Water Virology, in mid-1980, the number of groups has now risen to 21. More seem certain to be introduced in the 1990s. A major feature of the groups is the high level of independence and autonomy in the IAWPRC system, allied to the help which IAWPRC gives to their finance, publicity and publications. Such has been the growth in groups and their activities that they have now become the mainstay of IAWPRC's scientific and technical programme.

# Conferences span the globe

Biennial conferences have always been IAWPRC's principal activity. From the early water pollution research conferences in the 1960s, attendance grew to a peak in the mid-1970s. By the beginning of the 80s, attendances had fallen back. Analysis of the reasons indicated that a better balance of research and practice was needed in the conference programme. Also, demand grew from specialist groups to include symposia on their topics. The result was the 1988 Brighton biennial - an integrated programme of specialist seminars, general sessions with research papers, a large poster area and an equipment exhibition. This has set the pattern for the immediate future and the format will be repeated for Kyoto, Washington (1992) and probably beyond.

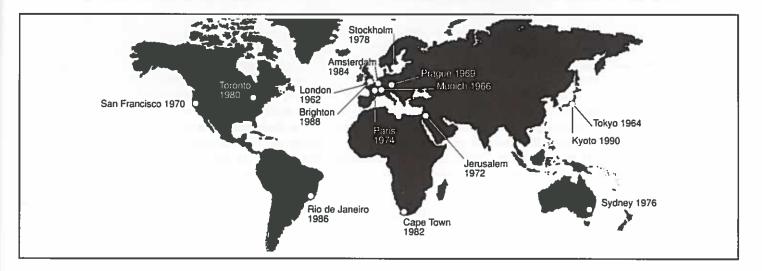
Not all the biennials have run smoothly. The planned 1968 conference in Prague, Czechoslovakia had to be postponed for a year because of the political problems there. Locations of all the

biennials held so far are shown on the map.

The Regional and Specialised Conference Programme has become highly developed since it began in 1972. This recognises members wishes for specialised conference topics and for colleagues in particular regions to meet to discuss common problems.

The first specialised conference, held in Vienna, Austria in September 1971, was on *Design-Operation Interactions at Large Treatment Plants*. Through the rest of the 1970s there was an average of 3-5 specialised conferences per year. Since 1981 this has expanded to 10-15 per year. Behind this growth was a scientific development plan produced in 1980 under the direction of Prof Poul Harremoës, now president of IAWPRC. This plan recognised members' needs for more specialisation in IAWPRC – the increased conference programme was part of the result.

Regional conferences began in 1985 with the first Asian-Pacific regional conference in Tokyo. This was repeated in Bangkok in November 1988. The first East African regional conference was held in Nairobi, Kenya in late 1989, and plans are now underway for a Middle East conference to be held in Cairo, Egypt in 1991.



#### On the record

Publications are the main line of contact between IAWPRC and its members. In terms of income and resources, they are the Association's principal activity.

Water Research grew out of the Journal of Air and Water Pollution, a Pergamon Press journal which itself began life as the Journal of Air Pollution in 1958. The air pollution journal was launched by Robert Maxwell of Pergamon following enactment of the UK Clean Air Act of 1958. Mr Maxwell was then a British MP and was responsible for the Act being passed. In 1967 Water Research became a separate journal with Dr Sam Jenkins as Executive Editor and Prof Wesley Eckenfelder as Editor. It has since grown to become the world leader in its field, as the latest citation evidence shows (right).

Water Science and Technology began life in 1972 as Progress in Water Technology, publishing the proceedings of the specialised conference on Application of New Concepts of Physico-Chemical Wastewater Treatment, held in Nashville, USA. In 1981 the journal was renamed, and now publishes all IAWPRC's conference proceedings. It is fast becoming recognised as a high calibre journal of international standing. Advances in Water Pollution Control, the book series, has developed from it, mainly for long established series of conferences.

Water Quality International magazine derived from an early typewritten newsletter started in September 1977. In 1981 this was changed to a typeset and printed version. By the mid-1980s the need for an Association magazine was recognised and WQI was the result. Many improvements have been made since its inception in January 1987. Gradually its technical content has been refined. A new layout and design in 1989, allied to fresh advertising agency arrangements have resulted in a lively, widely read and respected magazine. It has become, as planned, a major medium of communication between IAWPRC and its members.

The Yearbook was first produced in 1979 as a listing of members.

# The one the others quote

Latest figures from the Institute of Scientific Information (ISI) citation reports confirm *Water Research*'s leading position in its field. Indeed, the figures for impact factors show that *Water Research* has gained some ground with an improvement from 1.181 in 1987 to 1.308 in 1988. That is, on average, each article published in *Water Research* for the year 1986 was cited 1.308 times during 1987 and 1988.

IAWPRC's other journal, *Water Science and Technology* has also made significant progress, rising from an impact factor of 0.317 in 1987 to 0.477 in 1988.

Journal	Impact Factor		Water Resources	Limno- logy	Geo- sciences
	1987	1988			
Water Resources Research	2.057	1.600	1	2	-
Water Research	1.181	1.308	2	3	20
Water Air & Soil Pollution	0.663	1.025	3	•	
JWPCF	0.949	0.776	6	5	-
Groundwater	0.784	0.726	7	-	33
Water Science & Technology	0.317	0.477	14		-

In the 1980s it began to evolve into a comprehensive description of IAWPRC, its activities and its members. It has now become an attractive and very informative book, free to members. Sound commercial arrangements now cover the preparation, printing and distribution to members at no cost to the Association.

Scientific and Technical Reports came into being in 1987. They are a means of publishing international reports by IAWPRC task groups. Ultimately production should increase to two per year.

"One of the most encouraging results of the first three International Conferences is the increased communication among research scientists and design engineers regarding the same problem from different backgrounds, vantage points and requirements."

The words of Prof Erman Pearson, first president of the Association, writing in the editorial that marked the launch of *Water Research* as a journal in its own right, are as valid today as they were 23 years ago, emphasizing as they do one of IAWPRC's fundamental objectives, that of shared knowledge. It was a common interest and concern about the scientific and engineering problems of water quality management among a group of individuals from many different countries way back in 1960, that eventually led to first one conference and then another, and finally to the setting up of an association totally dedicated to the subject.

Many of those instrumental in setting up the early conferences and ultimately, the Association, are still playing an active part in IAWPRC. Sadly some are no longer with us, but they are remembered for their contributions as members of the Governing Board, national committees and conference organizers, as well as their expertise scientifically and technically. What all of these "founding fathers" could see was an increasing need for collaboration between the research scientist, the design engineer and the practitioner. What they probably could not foresee was how the Association's activities would expand to include as many as 15 conferences a year, three journals, and 21 groups specialising in their own particular aspect of water pollution control.

#### IAWPRC Presidents 1965-1990

#### Erman A Pearson 1965-69

Professor Erman Pearson became IAWPRC's first president with the adoption of the statutes and formal constitution of the Association at the Harrogate meeting in June 1965. He was a major driving force behind first the Steering Committee and then the early days of the Association. A graduate of Washington University, most of his career was spent at the University of California at Berkeley. He was considered to be a leading world expert on disposal of liquid wastes into marine waters.

#### Gerrie J Stander 1969-76

Another founding member of the Association and its longest serving president is Dr Gerrie Stander. A graduate of the University of Cape Town, he is best remembered in his native South Africa as the "father of water reclamation" for his work in the water research programme at the Council for Scientific and Industrial Research. Under his leadership this became the National Institute for Water Research of which he was director from 1957-71. From here he was appointed chief executive officer of the Water Research Commission until his retirement in 1979. Dr Stander's period of office as IAWPRC president coincided with the Secretariat being based in South Africa, until its permanent relocation to the UK in 1975. He also served IAWPRC as a vice president from 1966-69.



#### Bertil Hawerman 1976-80

Bertil Hawerman, IAWPRC's third president, has had a long and distinguished career working on water pollution control for both the Swedish government and latterly, as managing director of VAV, Sweden's Water and Wastewater Works Association. During his period of office the Secretariat became permanent with a full-time staff, and plans for the Association's future were laid. As conference president in 1978 he presided over the very successful 9th biennial in Stockholm. On the international front, Mr Hawerman has made valuable contributions to developing water pollution control in African countries as a consultant to the Swedish International Development Authority.



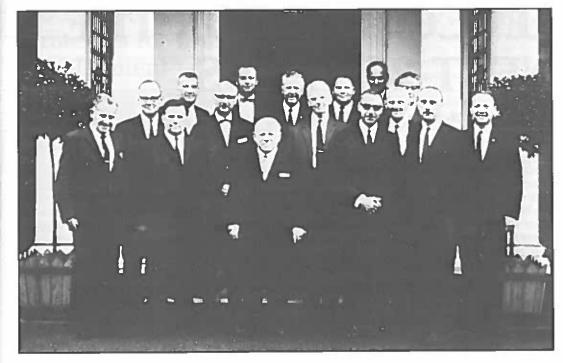
#### Richard S Engelbrecht 1980-86

Prof Richard Engelbrecht's three terms as president saw some of the greatest changes in the Association since its inception. A thorough revision of the original statutes and constitution together with the finances and administration, put IAWPRC onto a professional footing and ready for a major expansion in its activities. Specialist groups and a wide-ranging conference programme were introduced, and have increased IAWPRC's profile considerably. Prof Engelbrecht has been a member of the faculty of engineering at the University of Illinois at Urbana since 1954, and director of the university's Advanced Environmental Control Technology Research Centre since 1979. He continues to serve on IAWPRC's Executive Committee as immediate past president.



## Poul Harremoës 1986-90

Poul Harremoës has been IAWPRC's president for the last four years, during which the Association's future has been firmly mapped out. The Strategic Plan, formulated by the Scientific and Technical committee from input from the specialist groups, membership and other committees, has given the IAWPRC leadership a clear direction of how the Association should develop. Many of the ideas for increasing membership, developing the publications and introducing new activities have already been set in motion. Prof Harremoës intends to step down as president after the Kyoto Governing Board meetings, having successfully achieved one of his major aims, that of developing the scientific and technical activities of the Association. He is currently head of the department of environmental engineering at the Technical University of Denmark, where his interests include blofilm kinetics, the hydraulics of urban storm drainage and nutrient problems.



FOUNDING FATHERS: The Association's statutes were adopted at an historic meeting in Harrogate, England, on 26 June 1965. Left to right in the picture Dr Stander (S Africa), Prof Baars (Netherlands), Dr Coin (France), Prof Berger (USA), Dr Mueller-Neuhaus (FRG), Prof Eckenfelder (USA), Prof Jaag (Switzerland), Mr Steffen (USA), Mr Holroyd (UK), Prof Pearson (USA), Dr Josa (Spain), Dr Benedek (Hungary), Dr Jenkins (UK), Prof Madera (Czechoslovakia), Dr Descroix (France), Dr Fuhrman (USA).

Official announcement of the establishment of IAWPR came from Friendship Station, Washington, DC.

NEWS RELEASE

For Impediate Pelease

WASHINGTON, D. C. (date) An organization called the INTERNATIONAL ASSOCIATION ON WATER POLLUTION RESEARCH has been established. The major objectives of this new Association are to advance water pollution research in all nations, to improve communication among engineers and scientists engaged in such research, and to shorten the time lag between reporting of research findings and their practical application.

The establishment of the Association is a direct consequence of the need and support for such an organization demonstrated at the First International Conference on Water Pollution Research held in London in 1962, and the Second Conference held in Tokyo, Japan, in 1964. An indication of the aroused world interest in water pollution was reflected in the attendance by 700 delegates representing 27 nations at the latter Conference.

The next Conference, and the first to be held by the new Association, is now being actively planned for Munich, Germany, September 5-9, 1966. The Association's next Conference will be held in Prague, Czechoslovakia, in 1968.

The Acting Governing Board of the Association consists of the following persons:

Prof. Erman A. Pearson, President Dr. G. J. Stander, Vice-President Dr. V. Madera, Vice-President Mr. B. B. Berger, Secretary-Treasurer

Prof. J. K. Baars (Netherlands)
Dr. P. Benedek (Mungary)
Dr. Louis Coin (France)
Prof. W. W. Eckenfelder, Jr. (U. S.)
Mr. J. Griffiths (U. K.)
Mr. Ron Hicks (New Zetland)
Prof. Shigehisa Ivai (Japan
Prof. O. Jaag (Switzerland)
Dr. S. H. Jenkins (England)
Prof. Jose Paz Maroto (Spain)

Prof. E. Leclerc (Belgium)
Mr. R. S. Mehta (India)
Prof. Luigi Mendia (Italy)
Prof. Ayyad Morgan (U. A. R.)
Dr. G. Muller-Neuhaus (Germany)
Mr. C. D. Parker (Australia)
Prof. G. Rivas-Mijares (Venezuela)
Mr. Hillel Shuval (Israel)
Dr. Erik Vasseur (Sweden)
Prof. W. von der Emde (Austria)

For further information write to the Conference Secretary
P. O. Box 5557, Friendship Station
Washington, D. C. 20016

# **IAWPRC CELEBRATING** 25 YEARS 1965-1990

# ON COURSE FOR THE **NEXT 25 YEARS**

# IAWPRC's President presents his vision of the future

In 1990, at the biennial conference in Kyoto, IAWPRC celebrates its 25th anniversary. It has been 25 years of continuous growth - 25 years of ever increasing service to the international community of professionals working with water pollution in all its aspects; from the innovations in research to the day to day struggle of maintaining the effluent quality at the local treatment plant; from the problems still encountered with pollutants known for close to a century, like BOD, to the most exotic pollutants derived from the ingenuity of the chemical engineer and recently introduced as a service to society.

The history of the success of IAWPRC is interesting. However, it is more interesting to analyse the potential of the future. The real perspective is to derive from the past the experience from which to set the course for the years ahead.

There will be need for both grassroot initiatives and leadership. The environment has been a key issue since the start of the association. It will be the key issue for years to come. The world has inherited a number of conflicts, some social, some economical, some national, some racial. Over the years we see some radical changes: old conflicts appear to be defused only to have new ones take their place. An example of a new conflict are concerns related to the deterioration of the environment. Preservation of the environment, abatement of the pollution of the past and the concept of a sustainable society is building up to become a focal point of the new idealism.

IAWPRC has a role to play in such a scenario. To serve the world community the association has to widen its scope and to open up new horizons.

Today the association is dominated by professionals working with domestic and industrial water pollution and the techniques related thereto; sometimes with emphasis on the scientific aspects, sometimes encompassed into an integrated view of water management. That is why the association rather missed the boat when groundwater pollution became an issue of importance. There were only a few grassroot initiatives and leadership initiatives were difficult due to lack of membership support. Ground water pollution thus became a separate entity on the international scene.

IAWPRC has to reanalyse its inherited concept of the water environment. It is not just a matter of treating water that has been polluted. It is not just a matter of understanding the mechanism of eutrophication. Concern for the environment will be woven into society in a much more integrated manner than in the past. It is no longer just a matter of corrective measures. It is a matter of preventive measures that will require changes to our most fundamental concepts and our present set of values. It requires changes to social behaviour. individually and collectively.

The perpetual introduction of new organic chemicals has to be judged on a global scale and with a much better assessment of risk than is practised today. The greenhouse effect, ozone layer degradation, deforestation, desertification and so on are all related to water. Solving these problems will require new dimensions in the concepts of the association.

To analyse the problems of the future the association assigned the task to a committee. What are the problems of water pollution in the next century? The committee will present its approach and its tentative conclusions at Kyoto. It is no easy task to look into the crystal ball. It is even more difficult to synthesize from this the changes required to the concepts of the association with respect to water pollution.

There will be lots of opportunities for further analyses. I believe that one of the difficulties in assessing the future in relation to environment is that the new idealism will require such drastic measures that it will make changes to society

significant, and that most of these demands will be considered irrational by the profession. It will be very difficult to distinguish between reactionary attitudes and sound reservations. There will be a need to welcome young engineers and scientists to IAWPRC. We have to go out of our way to give them room to analyse the situation, assess their values and evaluate their options. It will require determined steps on the part of IAWPRC to encourage communication with a new generation. Our greatest risk is complacency based on our successes of the past.

The prestige of the association is a byproduct of the work of the association; not an end in itself. Prestige is the result of the professional work performed by individual members, by working groups, and conference participants. The association, its leadership and its organization is just the frame into which has to fit the professionalism of water pollution abatement. The leadership and the organization of the association can be proud of the accomplishments over the last 25 years; but the people to be congratulated are the professionals, who have provided the grassroot initiatives, the innovations and the day to day follow up.

The real product is the dissemination internationally of information on development in monitoring, analysing and understanding water pollution and developments in water pollution technology and abatement strategy. In this regard IAWPRC has been very successful. The founding fathers were wise enough to start a journal, now the most renowned international journal in the field. Today we have three publications. This provides the main income for the association. The importance of a sound economy should not be underrated as a prerequisite for making the frame available for the profession. Over the last 10 years we have organized in the order of 15-20 specialised and regional conferences

worldwide every year. We have established over 20 specialist and task groups, who deal in depth with matters of their own choosing, in the end providing their views on specialised matters for dissemination internationally.

To me, the essence of success is to provide a well functioning organizational framework into which the grassroot professionals may put their skills, ideas and efforts with a high degree of freedom. A keyword in this regard is confidence on the part of the leadership in the skills and good intentions of the grassroot initiators. The key is to provide opportunity.

It is not just a matter of organization. It is as much a matter of understanding the currents, sometimes the undercurrents, of the development of the profession. That requires a leadership group deeply embedded in professional issues in their daily work, people to whom the subject matter of water pollution and its abatement is more essential than the administrative and prestigious aspects of the international life of an association. The leadership of the future has to be chosen accordingly. We are fortunate by the fact that very competent individuals are prepared to offer their enthusiasm and their "spare time" and devote their energies to the profession.

I will wish for the association that it will be able to achieve a wider vision with respect to the water environment, including the strength to face constructively the irrationality of changing sets of values and the wisdom to listen to the next generation.

I want to thank present and past officers and the Executive Director for good companionship and friendship. I also want to thank the membership of the association for good collaboration over the last 12 years, where I have had the privilege and the pleasure of being vice president and president of IAWPRC.

Poul Harremoës