



## INSIGHTS

# Roland R. Wauer (1942–2020): neonatologist, scientist, teacher and visionary

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We mourn the loss of Professor Roland R. Wauer, for many years Director of Neonatology at Campus Mitte, Charité Medical University Berlin, Germany—our teacher, mentor and friend. As a student of Ingeborg Rapoport,<sup>1</sup> Roland Wauer, together with Dieter Gmyrek, Ludwig Grauel and Johannes Gross, set out in the early 1970s to improve the care of sick newborns and premature babies. This was urgently needed as infant mortality rates were high with up to 20 per 1000 children in both East and West Germany at that time. Despite the political and economic restrictions in the German Democratic Republic (1949–1990), Roland Wauer gained a leading role in international and interdisciplinary cooperations. He was one of the pioneers in developing structures such as perinatal meetings and mortality conferences. For the first time, every neonatal death could be critically discussed with the colleagues involved in an institutionalised way. By introducing such case-based discussions with a no-blame ethos, he focussed on the classification into “avoidable, conditionally avoidable and unavoidable” deaths as the starting point for critical analysis and fostered continuous team learning. This resulted in the optimisation of perinatal care and ultimately became apparent in the reduction of the infant mortality rate. The methodology used was very much in line with his personality as an interdisciplinary thinker, collegial scholar and teacher of

science. It is therefore all the more surprising that aforementioned perinatal discussions and mortality conferences nowadays have to be rediscovered as an international standard of quality management in perinatology.<sup>2</sup>

A characteristic of perinatal research in East Germany was the centralisation of newborn care at a limited number of centres. As of 1974, there were 22 centres, including 14 university centres. This situation allowed a coordinated approach by the large East German research and care institutions. Relevant topics in Neonatology could be identified and systematically evaluated. Roland Wauer with his ingenious, inquisitive as much as inventive mind and winning personality was also a pioneer of technological development for all aspects of neonatal care. Examples of his creative and progressive thinking were the development of the “Ventilette”, a respiratory support device for newborns, or his fascination with optimising the use of surfactant.<sup>3</sup> His scientific focus on the neonatal lung led to prosperous research, which was reflected in a sizable interdisciplinary project “The Perinatal Lung” and awarded by a funding by the German Ministry for Education and Research only shortly after the German reunification. For many years, Professor Wauer shaped the scientific profile of the Clinic for Neonatology at the Charité Campus Mitte in Berlin by advancing the knowledge on the neonatal lung. Together with his long-time scientific companion Dr. Schmalisch, he set up a research infant respiratory function laboratory. Under their joint guidance, their team would design, invent and build innovative devices for infant lung function testing. Roland Wauer’s team has set valuable standards in this field thanks to stringent protocols by which research nurse Silke Wilitzki tested hundreds of infants. Thus, over the years, a rich body of scientific work and a large number of publications evolved, which were internationally referenced over 3600 times.<sup>4</sup>

Besides his specific scientific interest in neonatal respiratory physiology and lung function, Roland Wauer was always open for interdisciplinary professional exchange and new ideas. With his clear vision for the future of neonatal care, he supported research in related fields. His ideal was an interdisciplinary approach to Neonatology together with prenatal medicine and obstetrics. Thus he recognised that the best way for children to grow up healthy was by combining perinatal care of the pregnant women and newborns with intense involvement of the parents. He always questioned his own actions as much as anyone else’s among his

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team to analyse the quality of the medical and nursing work in search of improvement possibilities. It was therefore a logical consequence that the Neonatology Department of the Charité, under the directorate of Roland Wauer, was among the first German centres to actively participate in the Vermont Oxford Network, thus allowing a direct benchmarking with large American centres. Meanwhile, he continuously implemented his visionary ideas of modern Neonatology: at the end of the 1990s, on his initiative, Mrs. Kruschwitz became the first social education worker in Germany to be hired exclusively for parent counselling in neonatal inpatient care—a project that was later developed into a dedicated parental training programme.<sup>5</sup> In 2000, Roland Wauer organised the first international conference on liquid ventilation, which was to be followed by eight further editions. In 2006, he successfully installed a camera system (Baby-Watch-System) at the Charité as one of the first in German neonatal units, ensuring that the family could also be able to encounter the new family member via the Internet. The many milestones of his academic career include his position as Vice-Dean of the Charité, where he was particularly successful in promoting the academic careers of women. Parity at all levels of professional life was a high priority for him, and he always took personal care to ensure that all of his employees experienced fairness and equal rights. One of his most memorable achievements was the institution of the Rahel-Hirsch-Fellowship programme at the Charité, which supports female early career scientists.

The carefully selected members of the team of doctors and nurses of the Neonatology Charité Campus Mitte enjoyed a particularly strong sense of community, which was supported by him as a role model with his presence and constant personal involvement. Roland Wauer was a director with a heart, a “primus inter pares”, who always had an open ear, a hearty laugh and sometimes a word of comfort for his staff. When Roland Wauer had reached retirement age, things did not get any quieter. He travelled the world as a senior expert and passed on his many years of experience to neonatologists in numerous countries. With great enthusiasm, he was committed to the welfare of newborns in China, Russia, some former Soviet republics and Bulgaria. With the last, he enjoyed a special link, having studied there and gotten familiar with the country and its people. It is therefore not surprising that he was responsible for the translation of his and other important neonatal standard works<sup>3</sup> not only into English but also always into Russian or Bulgarian; his name then reads as follows in the Cyrillic script “Роланд Р. Вайер”.

When we look back today on the time we were privileged to have spent in his caring company, the many facets of his professional life that influenced us will remain part of our memory and live on in us as his students. As a clinical teacher, Roland Wauer passed on his knowledge to many generations of paediatricians. As a scientist, he taught us that curiosity and responsibility for the exploration of new clinical findings are more important than the

impact factor of a publication. As Chair of the Clinic for Neonatology at Charité, Campus Mitte, he relentlessly fought to protect his department from divisive divisional politics and thus strengthened the sense of being part of a valued community in us. Beyond that, it is above all the small, personal experiences that bear witness to his enthusiasm, but also to his capacity to enthuse others, that have left a deep impression on almost anyone he met. Roland Wauer carried us along, he would set limits, he would encourage, criticise and praise—and he always did so with a great presence, in moderation and with much dependability. As a human being, he communicated his values to us in dealing with the patients entrusted to us and their parents. As a friend, he was always available for advice, an open ear or a helpful answer to our questions. Roland Wauer, we will miss you very much.

To honour the breadth of Roland Wauer's contributions to neonatal medicine, the “Deutsche Stiftung Kranke Neugeborene” ([www.dskn.org](http://www.dskn.org)), together with the European Society for Paediatric Research (ESPR), will create a travel fund to support medical students and junior trainees to visit well-known neonatal units throughout Europe to help experience first class neonatal research first hand. Applications for the “Roland-R.-Wauer-Award” will be advertised in the ESPR newsletter and on the ESPR website ([www.espr.eu](http://www.espr.eu)).

#### AUTHOR CONTRIBUTIONS

M.R., J.R. and C.C.R. drafted the initial manuscript. G.S., H.H., H.P., S.W. and H.W. provided input and reviewed the document. They shared first-hand accounts from the life of Professor Wauer. P.F. translated the manuscript from German to English. All authors contributed to the final completion of the manuscript.

#### ADDITIONAL INFORMATION

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