

## Curriculum Vitae

---



### Background:

Stefan Sachs  
Date of Birth: 20. Sept. 1955  
Place of Birth: Pforzheim, Germany  
Nationality: German  
Marital Status: married, two children (born 1982 and 1986).

Address: Ringreiterweg 20  
D – 23558 Lübeck  
Germany

Telephone: +49(451)8993444  
Fax: +49(451)8993445  
Mob. Phone: +49(171)2114262  
email: [ssachs@acm.org](mailto:ssachs@acm.org)  
web: [www.ssachs.de](http://www.ssachs.de)

---

### Education:

1961–1965 Primary School  
1965–1974 Secondary School.  
1974 Matura  
1974–1979 Universität Stuttgart, Mechanical Engineering, Main  
Subjects: Computer Science and Numeric Control of Tool  
Machines.  
1980 Diploma (MA)  
1988 Promotion

---

### Research and Teaching Experience:

1980–1986 Assistant at Institut für Kernenergetik, Universität Stuttgart.  
Held classes in the field of Numerical Solution of Partial  
Differential Equations. Supervised graduands.

1980–1983	Developed a rule based system for the simulation of attitudes in cooperation with psychologists from Psychologisches Institut der Universität Tübingen.
1983–1986	Designed a language for the description of decision heuristics and integrated it with the rule based system mentioned above for the simulation of decision processes.
1984–1986	Doctoral Thesis: Development and application an expert system for the selection and assessment of heating installations using the rule based system mentioned above.
1988	Promotion
1999–2000	Lecturer Fachhochschule Lübeck (Software Design, UML)

### Skills:

Fields of Experience	Optimisation(NLP), Decision Support, Configuration (System Configuration, not CFM), Compiler Construction, Code Generation OOA–OOD (UML), GUI–Design, Safety Critical Software Systems, Embedded Systems
Programming Lang.	Fortran (IV, 77), Pascal, Prolog (Borland, Arity), Smalltalk (VSE, VA), C, C++, JAVA, Objective–C
Environments, Tools	CM: ClearCase, Envy, CASE/UML: Rational Rose 98, RE: DOORS, IDE: Parts, Parts for Java, Visual Age, Visual Studio, Xcode RT Emulators: HP (68000), TI(34010), Lauterbach(Power)
Operating Systems	VMS, Windows (9X ,NT, XP), UNIX (HP), pSOS, Proprietary RTOSes, Max OSX
Applications	Textprocessor (Wordstar, Word), DTP (Pagemaker, MS Publisher, Pages), Spreadsheet (Excel, Numbers), Picture Processing (Picture Publisher, Photoshop), Vector Grafics (Designer, Corel Draw), HTML Editor (Frontpage)

### Industrial Experience:

1983–1986	Consultant for small firms in the field of AI applications on technical problems. Implementation of an system for the assessment of road building projects.
1987–1989	Development engineer at Philips Kommunikations Industrie AG, Siegen. Design and implementation of an expert system for the configuration of networked systems. Project leader of an international workgroup.
1989–1998	Development engineer at Dräger Medical, Lübeck. Design and implementation of a Smalltalk based tool for prototyping and visual programming of user interfaces.

since 1998

Consultant, specialised in user interfaces for financial applications and medical systems

---

**Projects:**

- |               |   |
|---------------|---|
| 01/87-06/89   | Development engineer at Philips Kommunikations Industrie AG, Siegen.  |
| 01/87-02/88   | Design and implementation of a PROLOG based expert system for the configuration of microcomputer systems.   |
| 03/88-06/89   | Design and implementation of a Smalltalk-based expert system for the configuration of networked minicomputer systems. Project leader for an international workgroup.  |
| 07/89-06/98   | Development engineer at Dräger Medical, Lübeck.   |
| 07/89-12/91   | Design and implementation of a Smalltalk based tool for prototyping and visual programming of user interfaces.  |
| 01/92-12/92   | Prototyping and evaluation of the UI of an anaesthesia monitor together with UI experts and users.<br>Interfacing the code generation capabilities of the tool to the measuring and data management software of the monitor achieving production quality in 1992 (Dräger PM8050). |
| 01/93-04/94   | Extension of the tool to support configurable screen contents, prototyping and implementation of the central monitor of an anaesthesia workstation (Dräger PM8060)..  |
| 05/95-12/96   | Extension of the tool to generate code for safty critical systems (dual channel control of actuators in an anaesthesia workstation (Dräger Julian).   |
| 01/97-09/97   | Design of a framework for self configuring, component based systems with special attention for the safety and reliability requirements of medical systems.  |
| 10/97-05/98   | Extension of the tool mentioned above to support localisation (support for Kanji.) and generation of optimized fonts for the target system.   |
| 07/98 - 02/99 | Consultant for ZEDA, Wuppertal, IT, Design and implementation of a user interface for a financial application in in VA Smalltalk.   |
| 03/99 - 02/01 | Consultant for GEFA, Wuppertal, IT, Participation (User Interfaces) in a large project (Leasing-application: Front End VA Smalltalk, Oracle + TopLink for persistency, SAP for the financial part, proprietary, rule-based system for the internal logic, about 60 MY)            |
| 03/01-11/01   | Consultant for Dräger Medical, Anaesthesia.<br>Participation in the development of an anaesthesia workstation (Dräger Primus).  |

03/01-07/01	Design and implementation of safety-relevant GUI components (Dual channel transfer of settings for actuators) Design tool was Rational Rose (UML), Implementation in C++ and C (multi processor system)
08/01-11/01	Design and implementation of real-time displays (RT-curves, parametric loop displays).
12/01-09/05	Consultant for Dräger Medical, Intensive Care Participation in the development of an IC ventilator (Dräger Evita XL). Development processes according to FDA requirements using DOORS as primary documentation tool. Implementation in C. Defect and change tracking in ClearQuest.
12/01-12/03	Design and implementation of GUI components and control procedures (User interfaces for calibration control and screen configuration).
01/04-03/04	Implementation of signal processing algorithms. (Leakage detection and compensation)
04/04-11/04	Design and implementation of GUI components and control procedures (UI for control and result evaluation of measuring manoeuvres).
04/05-09/05	Maintenance for the IC ventilator mentioned above.
05/07-07/07	Consultant for Itellium, Nuremberg; Programming of Extensions for a Smalltalk (OS) based CRM system.
09/07-04/08	Consultant for Dräger Medical, Intensive Care Design and implementation (in C ) of an interface for the remote control of an IC Ventilator. RE in DOORS, defect and change tracking in ClearQuest.
05/08-06/09	Consultant for Dräger Medical, Intensive Care Extensions and localisation of the user interface of an EIT-Monitor. Implementation in C++ (Visual Studio) on a PC-based front end. Localisation with own tools and SDL Passolo.
since 2004	Development of own CASE tools for Mac OSX.