DR. -ING Wenhao WANG

SOFTWARE ARCHITECT

10 years professional experience in software industry



— Professional Experience

01/2023- Solution Architecture Lead, Stellantis (ex PSA Group), Poissy, France.

Present Deliver solution architectures and requirements for STLA-Brain project.

- Work on technical convergence with system and software team and review system deliverables.
- o Design first level of (service-oriented) architecture before handing over to Solution Architects.
- o Organise architectures reviews with Solution Architects.
- Coordinate with project managers, function owners, product owners, SW architect team, validation team. STLA-Brain is the strategic Software Define Vehicle (SDV) project of Stellantis.

Highlights: SOA, AUTOSAR, ISO26262, Cyber Security, ASPICE, UML/SYSML, Rhapsody, SAFe Agile.

06/2018- Software Architect, PSA Group, Poissy, France.

12/2022 Design safety SW architecture for **Battery Management System (BMS)**.

Design AUTOSAR applications architectures for Engine Control System.

- Analyse system requirements and transform software related parts into SW requirement.
- Design software components to allocate the requirements and define the interface between components.
- Lead software component development process.
- o Organise technical review with development team to insure the consistency and traceability.
- Develop and maintain the in-house tool (JAVA) to manage and deliver the SW architecture.
- o Coordinate with tools development team, components development team, suppliers.

Highlights: AUTOSAR, ISO26262, ASPICE, UML, JAVA, Hibernate, Maven, GIT, Enterprise Architect.

- 04/2017- Software Engineer, ARONDOR, Paris, France.
- 05/2018 Develop the new services & functionalities for the company's core editor based on **Scrum** agile framework. *Highlights:* Microservice, JAVA, Spring, Docker, GWT, TDD, GIT, Maven, Elasticsearch,
- 04/2014- Software Design Engineer PhD, VALEO Electrical System, GEEDS, Créteil, France.
- 04/2017 Design a method of distributing automotive embedded and real-time software on a multi-core architecture (patented) and develop a toolchain (by JAVA).
 - Analysis and Design the applications compliant with AUTOSAR.
 - Allocation and scheduling of applications on **multi-core** system automatically.
 - Configuration of OS & RTE adapted to commercial tool EB Tresos.
 - Validation & Verification on target TriCore microcontroller by debugger Lauterbach Trace32.

Highlights: Multi-core system, Optimisation, AUTOSAR, HW/SW Integration, JAVA

Educational Experience

- 2014-2017 Doctor of Science and Theology, CY Cergy Paris University, Cergy, France.
- 2011-2013 Master of Computer Science and Systems, École Nationale Supérieure de l'Électronique et de ses Applications (ENSEA), Cergy, France.

A leading European graduate school in electrical engineering in France

2006-2010 Bachelor of Telecommunications Engineering, Sun Yat-Sen University, Canton, China.

Competencies

Professionnel o JAVA, C/C++, Python, MATLAB, Assembly language

- o Embedded & Real-time OS, Linux, Kubernetes (K8S), Docker, AWS
- o Microsoft Office, VBA, OpenOffice, LATEX

Linguistic French: Fluent English: Fluent Chinese: Native German/Italian: Beginner

Additional Information

- 01/2016 Participate in 8^{th} European Congress Embedded Real Time Software&Systems $(ERTS^2)$, Toulouse. Paper & Communication
- 02-07/2010 Teaching assistant (TA) for Analog Electronics courses, Sun Yat-Sen University (SYSU)

Hobbies

Sports (Half-marathon), Travel, Music, Art