Embedded Expertise

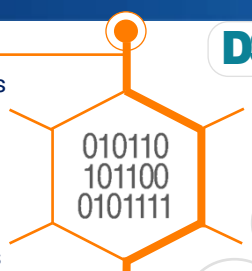
GENERAL

Knowledge Domains

- Silicon and pre-silicon model validation
- FPGA, µC, CPU - ARM, PowerPC etc.
- Board bring-up on any complexity, analog and digital
- Boot loaders, Security services
- FW & SW architecture design, BSP, PAL
- Driver development, Power management aspect
- Linux multimedia, Android frameworks, graphic controllers
- Industrial buses and residential communications
- Networking, QA services, testing frameworks
- Code customization. upgrade & refactoring
- UI / UX expertise

Over 10 years experience

20+ senior specialists



NETWORKING

Low-level scope

- Boards bring-up
- System porting and device drivers for various L2/L3 equipment
- Core switching / routing infrastructure
- Working with test equipment, traffic generators
- Features enhancement

High-level scope

- Network management systems integration
- Workgroup, Enterprise, Metro network solutions
- Chassis solutions, redundancy, stacking feature
- Solution productization

IP Suite
OSI Model

IEEE 802

Network security

Network performance

TELECOMMUNICATIONS

Low-level scope

- Hardware debug, ECNs
- Operation System porting, RTOS, Linux
- Various bootloaders, upgrades
- BSP, Linux Kernel driver development
- Power management

High-level scope

- Android frameworks
- Embedded systems simulation
- VOIP, Multimedia processing
- Benchmarking, performance analysis

Benchmarking

Standards compliance

Drivers development

OS porting

HW debug

AUTOMOTIVE

Low-level scope

- Analog and digital signal processing and process control
- Actuator devices
- CAN buses, LIN, MOST bus

High-level scope

- Voice interface – Speech Signal Enhancement and SDK
- Interactive human to artifact logic, driver assistance
- Multimedia processing - cameras, distribution of audio and video
- Telecommunication and other wireless technologies

Diagnostic

Safety

Infotainment

Comfort

PROCESSES

R&D

Quality

Management

Management Processes:	Agile, SCRUM, V-Process, Waterfall
Development standards:	ISO C, C++ ISO/IEC 14882, MISRA C/C++
Quality Standards:	ISO/IEC/IEEE 29119

Embedded Expertise (Automotive)

in GENERAL

Knowledge Domains:

- Silicon and pre-silicon model validation
- FPGA, µC, CPU - ARM, PowerPC etc.
- Board bring-up on any complexity, analog and digital
- Boot loaders and vendor specific services - security, updates etc.
- RTOS, Linux Kernel, Driver development
- FW & SW architecture design, BSP, PAL
- Power management aspect
- Linux multimedia, Android frameworks, graphic controllers
- Industrial buses and residential communications
- Networking
- QA services, testing frameworks
- Code customization. upgrade & refactoring

Over 10 years experience

20+ senior specialists

for AUTOMOTIVE

Safety: ABS, ESP, TCS, ECB, lane keeping, air bag, cruise control, steering, PCS, driver assistance

Transmission

Engine

Diagnostic

Comfort: climate, wipers, seat adjustments, lighting

Low-level scope:

- Sensors and signal processing - analog and digital
- Process control – analog and digital processing, programmable logic device, µC, CPU.
- Actuator devices
- High-speed and low-speed CAN buses, LIN, MOST bus

High-level scope:

- Voice interface - Speech Signal Enhancement and SDK
- Interactive human to artifact logic, driver assistance,
- Multimedia processing - cameras, distribution of audio and video
- Telecommunication and other wireless technologies
- UI / UX expertise

Infrotainment: audio, navigation, traffic info, voice interface

about PROCESS and QUALITY

R&D Methodologies:
- AUTOSAR Framework
- Windows Embedded Automotive

Quality Standards:
- ISO/IEC/IEEE 29119 Software Testing
- Application Services Library

Safety Standards:
- ISO 26262 Functional Safety
- Automotive Safety Integrity Level

Management Processes:
- Agile, SCRUM, V-Process