Ara-1 M.2 (M-Key) Module for AI-Integrated Cameras and Embedded Systems

ARA-1-M2-MODULE

Not Recommended for New Designs

This page contains information on a product not recommended for new designs. Specifications and information herein are subject to change without notice. For additional information, please contact NXP support or your NXP sales representative.

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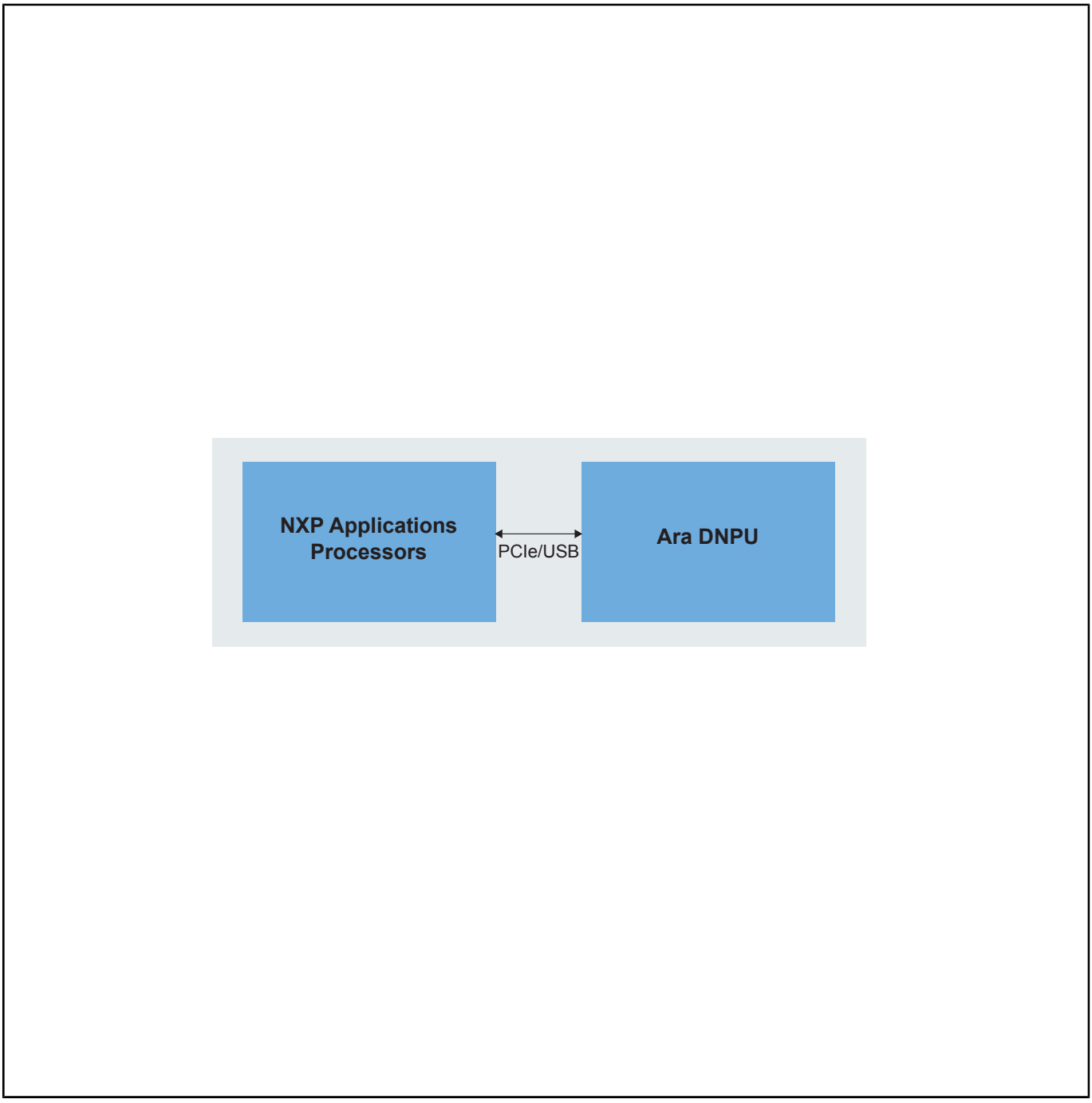
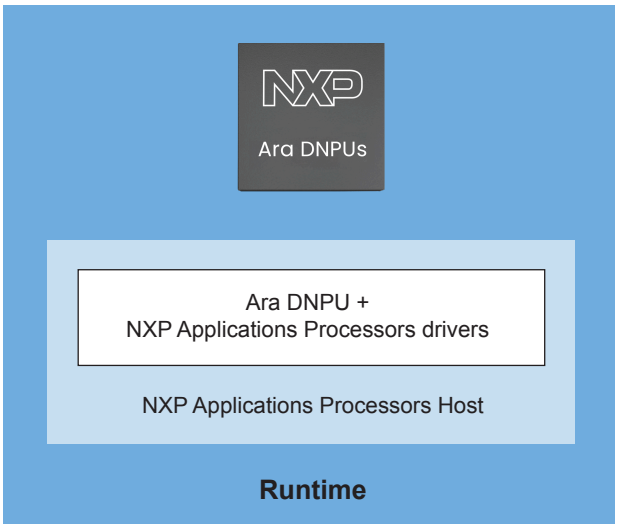
The Ara-1 M.2 module is a compact AI accelerator designed for edge computing, offering real-time AI inferencing with low power consumption and fast processing speeds. It integrates the Ara-1 Discrete Neural Processing Unit, 1 GB LPDDR4 memory, and supports AI frameworks like TensorFlow, PyTorch and ONNX. It enables on-device AI without cloud connectivity, ensuring low latency and enhanced privacy.

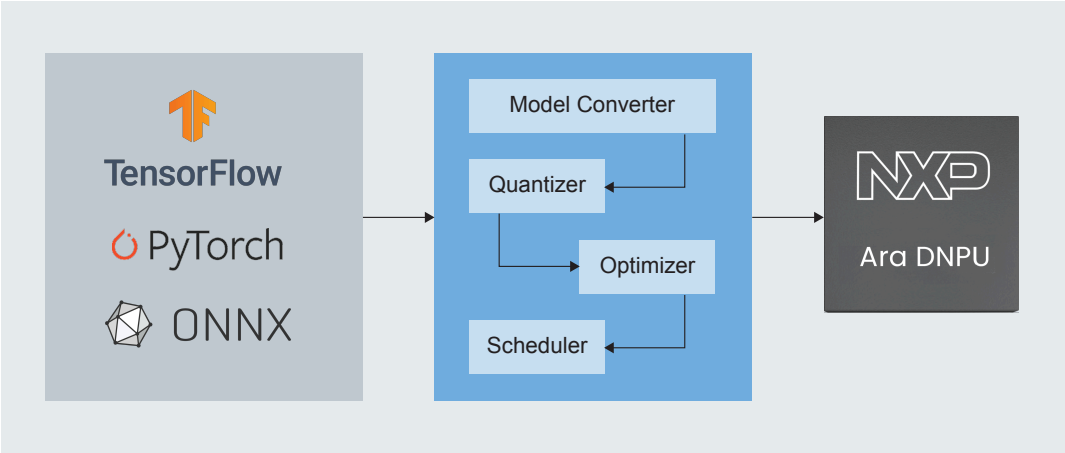
NXP Applications Processor and Ara DNPU Connection Block Diagram



Integration of Ara DNPU and Applications Processors Host with Drivers Block Diagram



Machine learning deployment flow Block Diagram



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