

AVVISO DI SEMINARI

(1) Mercoledì 22 maggio 2024, 13:30-15:30

(2) Giovedì 23 maggio 2024, 13:30-15:30

Aula D – Sede Didattica

Dipartimento di Ingegneria e Architettura

Università degli Studi di Parma

Titles

- (1) Tools for automated conversion and deployment of AI workloads on heterogeneous hw
- (2) Practical demonstration using ST EdgeAI unified CLI on ST heterogeneous sensors and MCUs

Joint Abstract

Understand and accompany both Tiny Machine Learning and Embedded engineers in their AI journey toward innovation is becoming of paramount priority for a large enterprise which ambition is to be a leader of AI hardware and software solutions at the edge. There is an increasing demand of new tools to support these communities in being faster, more productive to unleash their creativity more than ever, especially in small and medium enterprise where investments cannot be wasted. To help that, ST devoted its best resources across product divisions and system research to create the Unified AI Core Technology interface. It acts as the enabling unifying AI technology to serve all heterogeneous products such as micro-controllers and sensors. Furthermore, this technology interfaces the most widely used Deep Learning representation standards such as Google Keras, QKeras and Tensorflow Lite and the Open Neural Network Exchange (ONNX). It outputs optimized C code across heterogeneous instruction sets with public APIs for STM32, STM32N6, Stellar MCUs and AI MEMs sensors. Demonstration of the tool in action will be provided to the audience.

Bio of the Speaker

Danilo PAU is Technical Director, IEEE AAIA & ST Fellow, APSIPA Life Member in STMICROELECTRONICS. Danilo (h-index 28, i10-index 75) graduated at Politecnico di Milano. He worked on memory reduced HDMAC HW design, MPEG2 video memory reduction, on video coding, transcoding, embedded (Khronos) 2/3D graphics, and (ISO/IEC/MPEG CDVS and CDVA with Leonardo Chiariglione) computer vision. Currently, his work focuses on the ST Unified AI Core Technology. He supervised many students.

Il seminario è tenuto nell'ambito del corso di Internet of Things (IoT). Per maggiori informazioni contattare il docente, prof. Gianluigi Ferrari (gianluigi.ferrari@unipr.it).