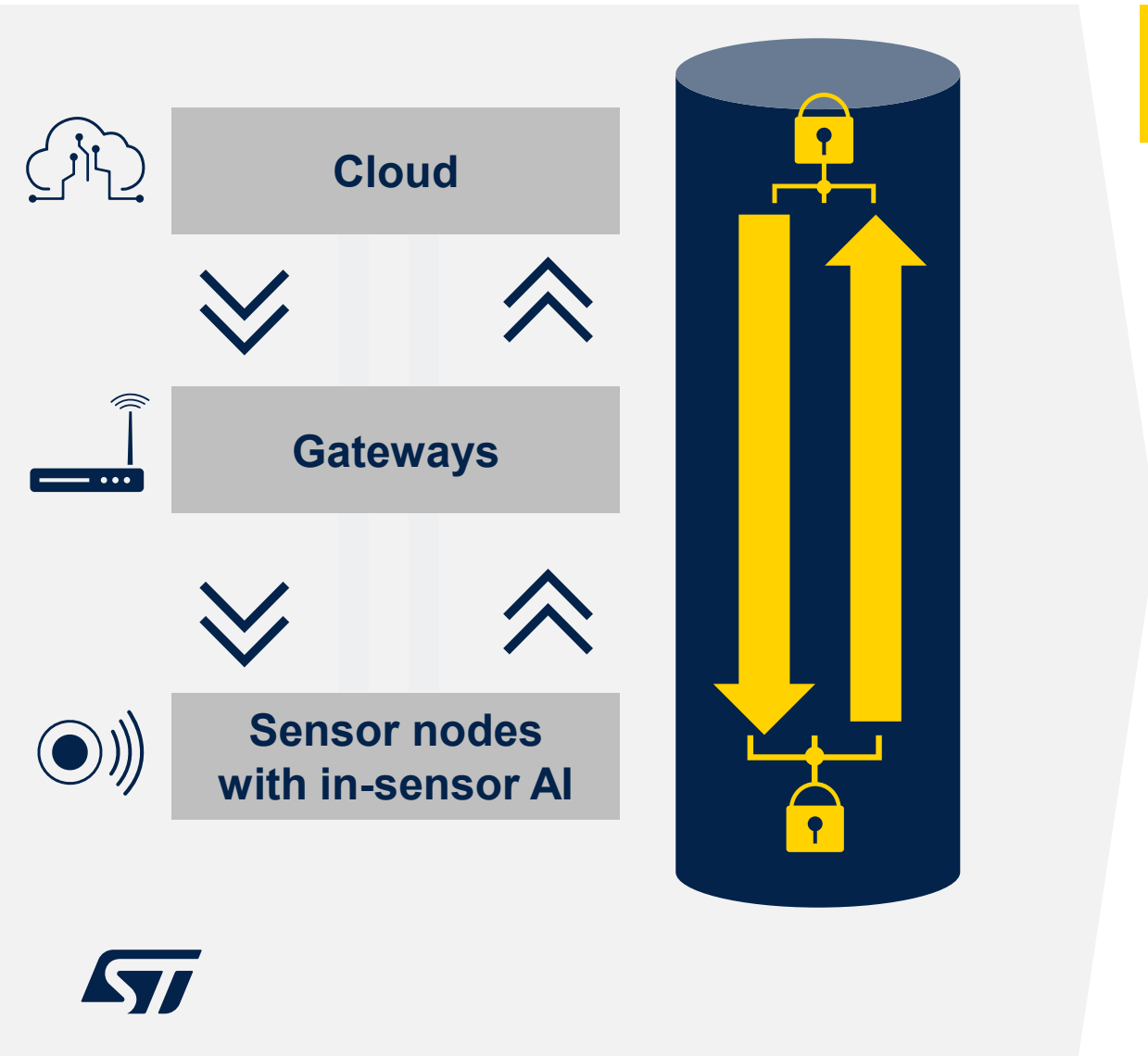# Simplifying edge AI deployment in sensor-to-cloud solutions

Discover the ST AIoT Craft online tool

Streamline in-sensor AI programming in IoT nodes

Cloud

Gateways

Sensor nodes with in-sensor AI

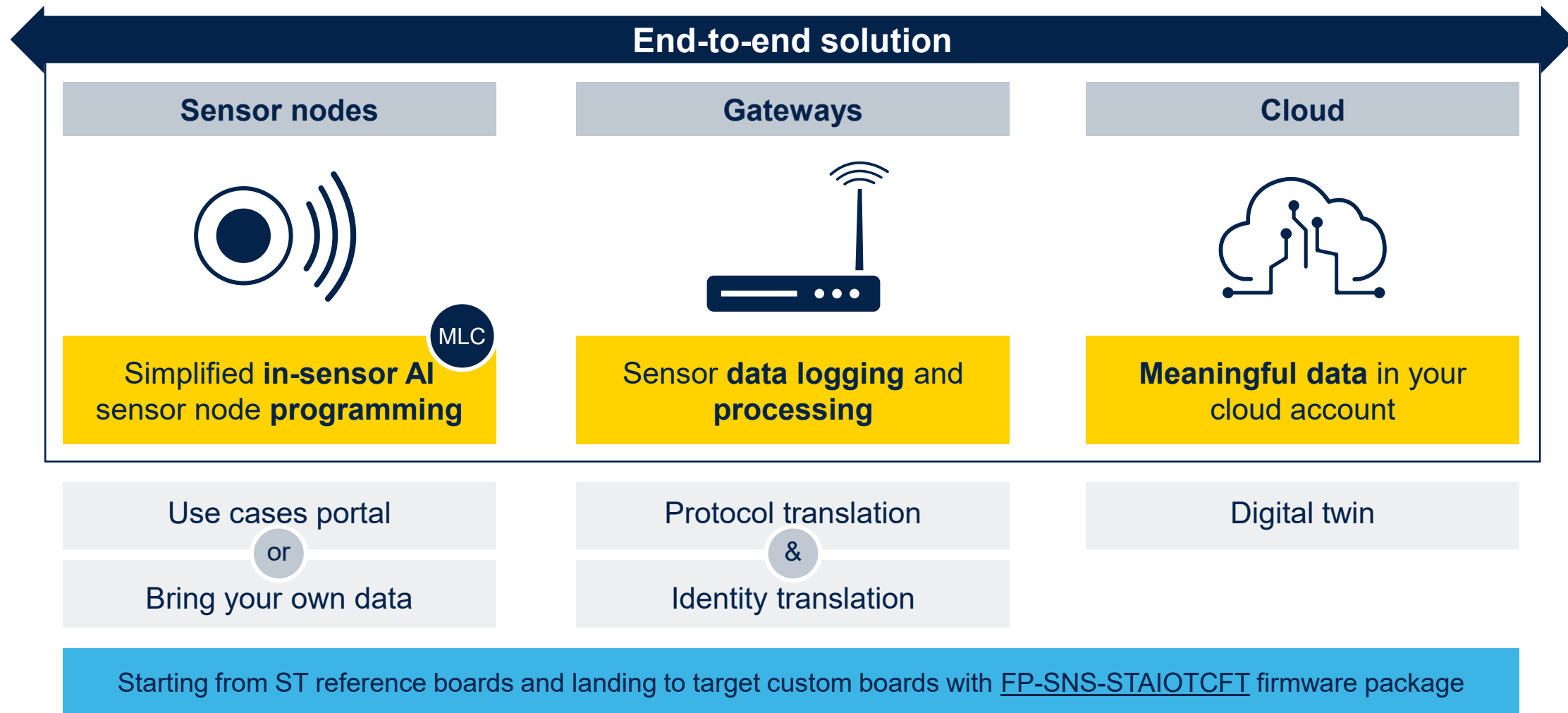## Create your full node-to-cloud solutions with ST AIoT Craft

A secure, user-friendly online platform for in-sensor AI* programming

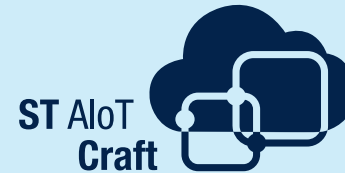**One tool offering multiple functionalities for developing AI-enabled IoT projects**

Providing examples for reuse and/or customization

Simplifying collaboration between AI specialists and software engineers

* Machine learning core (MLC) technology

ST AIoT Craft is a cloud-based tool for AI specialists and software development engineers

End-to-end solution

Sensor nodes	Gateways	Cloud

MLC

Simplified **in-sensor AI** sensor node **programming**

Sensor **data logging** and **processing**

Meaningful data in your cloud account

Use cases portal	Protocol translation	Digital twin
or	*&*	
Bring your own data	Identity translation	

Starting from ST reference boards and landing to target custom boards with FP-SNS-STAIOTCFT firmware package

ST AIoT Craft: the easy experience in 3 steps

ST AIoT Craft

1. Create dataset

Connect your board, log your dataset and push it on cloud.

On cloud no code training

Collect data with your board	Upload collected dataset on cloud	Prepare the dataset for training step

Dataset examples

or

Bring your own data

2. Train ML model

Train ML decision tree on collected dataset in the cloud.

On cloud no code training

Check out in cloud dataset	Configure and start in cloud training	Trained ML model stored in cloud

Model examples

or

Model from scratch

3. Deploy IoT system

Setup your cloud connected IoT system and monitor model inference result.

End-to-end solution

Sensor nodes	Gateways	Cloud
Simplified in-sensor AI programming	Sensor data logging and processing	Meaningful data in your cloud account
Use cases portal	Protocol translation	Digital twin
or	&	
Bring your own data	Identity translation	

Test, validate, and develop your IoT application leveraging in-sensor AI

Accelerate

- Discover ready-to-use application examples with **Flash&run** and **AutoML for in-sensor AI programming** (machine learning core technology)

- **Quickly create decision tree algorithms** on the IoT node for expert machine learning engineers to support use case clarification

- **Build datasets among users** for a robust AI algorithm

- Save time and easily access the online tool as it requires **no installation**

Scale up

- **Develop your AI application and provision your IoT node** with a single tool. Save time with seamless installation and configuration.

- Adapt or reuse existing case studies to fit **application needs.**

- **IoT system flexibility:** connectivity extension with Bluetooth Low Energy and firmware package for custom boards

- **Share your models and datasets across projects** for multiple users

Advanced security features based on the latest security mechanisms, including encryption, identity and access management, and threat detection.

The key ingredients for IoT project development with ST AIoT Craft
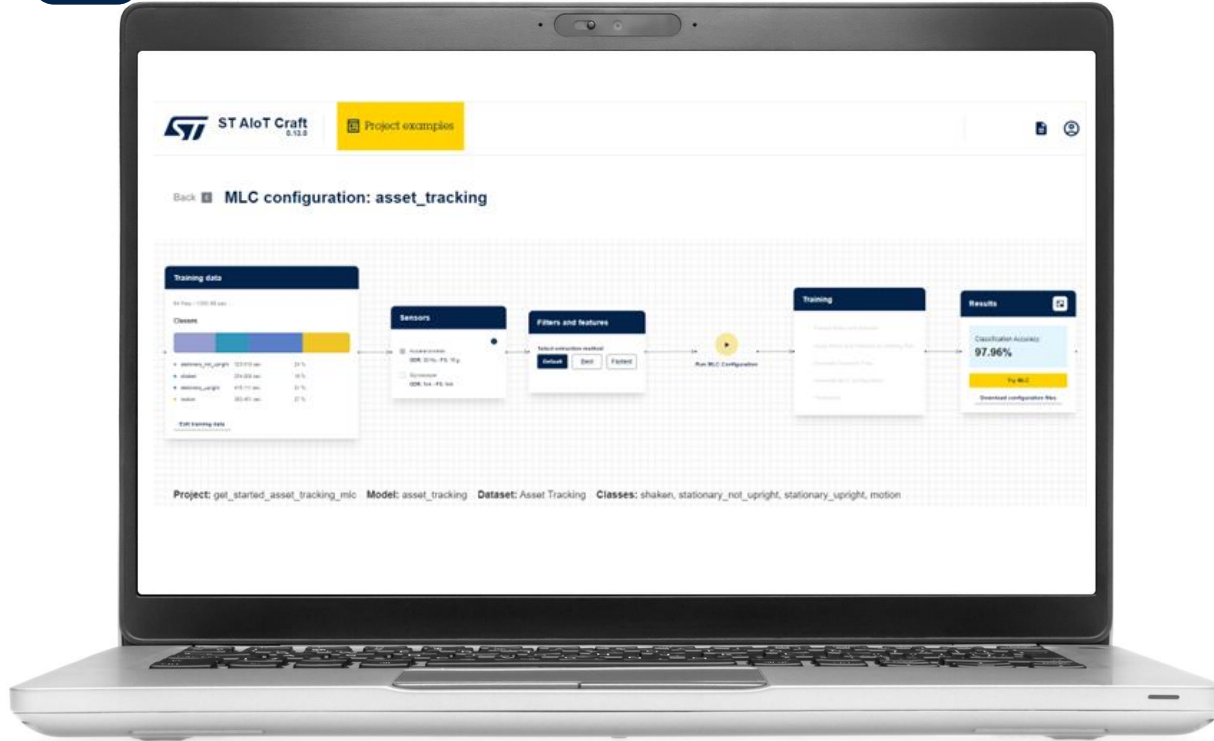
staiotcraft.st.com

ST reference IoT boards, gateway, cloud, and mobile application

MLC In-sensor AI technology (machine learning core)

Integrated ST software tools and hardware

Dataset and project privacy

ST AIoT Craft 1.2 version

What's new?

Sharing among users
projects and data sets

New MEMS sensor supported
LSM6DSV80X and LSM6DSV320X IMUs

IoT system flexibility
BLE connectivity, firmware package for easy project porting to custom boards

Quick learning with dedicated course
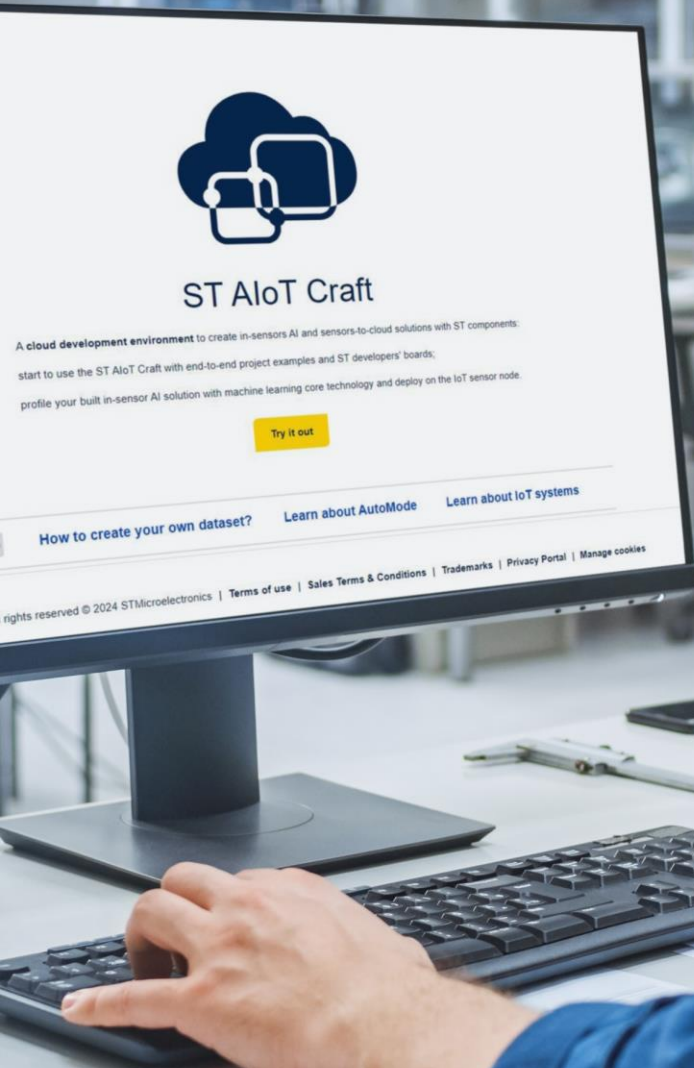
Pick up use cases from Edge AI case studies

The ST AIoT Craft tool is powered by the ST Edge AI Suite

ST Edge AI
Suite

Ideation	→	Data	→	Bring your own data	OR	Bring your own model	→	Benchmark	→	Deploy
				AutoML End-to-end flow		Model optimization				

Ideation
- Case studies
- ST Edge AI Model Zoo

Data
- High Speed Datalog

AutoML End-to-end flow
- NanoEdge AI Studio
- Hand posture ToF AI
- **NEW** ST AIoT Craft

Model optimization
- STM32Cube.AI
- AI for OpenSTLinux
- MEMS Studio
- Stellar Studio AI
- ST Edge AI Core

Benchmark
- ST Edge AI Developer Cloud

Deploy
- Code examples

- Online tool & resources
- Desktop tool

🌐 Explore at st.com/st-edge-ai-suite

Our technology starts with You

Start now at staiotcraft.st.com