

1. General Questions

What is Corazon AI?

Corazon-AI is an edge AI platform built on Zynq Ultrascale+ MPSoC device integrated with Xilinx Vitis-AI stack enabling instantaneous real-time decisions on the edge.

Is Corazon-AI a Development platform or a Solution platform?

Corazon-AI is a solution platform where one can directly deploy use cases with minimum hardware design effort.

Corazon AI and ZCU104, are they the same?

No.

Corazon-AI is a solution platform and it is designed such that the developer can develop their end application directly on this platform without the need for redesigning the hardware.

ZCU104 platform is a development platform. After evaluation the user can redesign the custom hardware for uses cases.

Is there any demo available?

Yes. We have demos available for
face recognition,
people counting,
social distancing,
Object detection, etc.

How can I run my applications on Corazon-AI?

Please refer our software user guide to run the applications.

Are there any pre-built binaries available for Corazon-AI?

The CorazonAI deliverables have pre-built applications and its source code.

Refer the software user guide to run the pre-built applications.

Also, the pre-built application source code can be modified as per customization requirements.

2. Hardware

How do I access the hardware user guide for Corazon-AI?

The deliverable package will have the hardware user guide which will be shipped along with our Corazon AI platform.

Also, the user can request for the same by writing an email to the mail ID
Fpga-design@iwavesystems.com

How can I get a loaner board?

User can request for the same by writing the email to the below mail ID.

fpga-design@iwavesystems.com

How do I connect my hardware peripherals to Corazon AI?

Please refer our hardware user guide for the peripheral connection procedure.

How do I power ON the Corazon-AI platform?

Please refer our Quick start guide for the Power ON procedure.

How to connect the debug port of Corazon AI platform to host system

Please refer our Quick start guide for the debug port connection procedure.

Is debug console available in Corazon AI?

Yes. The debug console cable is part of deliverables for Corazon AI Engineering version platforms

Is WiFi and Bluetooth supported

Yes. Please refer our product hardware configuration for the exact Hardware platform.

Is LTE supported

Yes. Please refer our product hardware configuration for the exact Hardware platform.

3. FPGA

Can I modify the FPGA design?

Yes, it is possible to add additional interfaces such as sensors/other interfaces.

Please refer our FPGA user guide to modify the FPGA design.

Can I develop only application without modifying the petalinux and FPGA design

We provide pre-build binaries enabled with library and Packages required for developer to develop the application.

Petalinux or FPGA design customization is required when the pre-build binaries are not meeting the required application specification.

4. Software

How to get the software deliverables?

The deliverable package will be shipped along with our Corazon AI platform.

Also, the user can request for the same by writing the email to the below mail ID.

fpga-design@iwavesystems.com

How is the host system configuration used for the development?

Please refer our software user guide for the Host system configuration

How to run my applications/modify the pre-built applications

The Corazon AI deliverables has pre-built applications and its source code. Refer the software user guide to run the pre-built applications. Also, the pre-built application source code can be modified as per user customization.

Are there any pre-built binaries?

Yes. The Corazon AI deliverable package has pre-built Neural network Models and sample application.

Please refer our software user guide to run the sample applications.

Can I modify peta-linux?

Yes. It is possible to add additional interfaces such as sensors/other interfaces.

Please refer our software user guide to modify the Peta-linux design.

Can I run custom applications?

Yes, please refer our Release note to confirm the required libraries or package added already. In case of additional package for custom application, please refer our software user guide to add packages in Peta-linux.

Can I run custom models?

Yes. The user can deploy their custom models CNN based models on the platform.

Deep Neural Network Features and parameters support the DPU.

Can I develop only application without modifying the peta-linux and FPGA design

We provide pre-build binaries enabled with library and Packages required for developer to develop the application.

Petalinux or FPGA design customization is required when the pre-build binaries are not meeting the required application specification

Is there any cloud connections supported?

Yes, so far the platform supported the three main stream cloud platforms AWS, IBM, and Azure.

For the configuration support, please write an email to below email id.

fpga-design@iwavesystems.com

What is the boot media supported by default?

By default, the platform supports emmc booting media.

Can I run my applications from USB memory stick?

Yes. For the flexibility development testing, the platform supports multiple USB3.0 slots to connect the pen drive devices. User can use these slots to connect the pen drive and run their applications.

Is NFS supported in Corazon AI?

Yes. Refer our Software user guide to validate NFS.

Can I run my applications via NFS

Yes, user can run the application via NFS

Can I run my application without connecting display?

Yes. The X11 forwarding display and Gstreamer options are available for the user to stream the output frames on the host PC via an ethernet.

Can I steam my processed output to the host system via ethernet?

Yes. The X11 forwarding display and Gstreamer options are available for the user to stream the output frames on the host PC via an ethernet.

5. Cloud

Can I send processed data to the cloud?

Yes, the user can use the MQTT based application to send the data to the cloud.

Can I send my processed data to cloud via WiFi or Ethernet or LTE?

It has been tested using the Wifi & Ethernet connectivity.