DPDK
DATA PLANE DEVELOPMENT KIT

Platform Specific Guides

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The following are platform specific guides and setup information.

OCTEONTX BOARD SUPPORT PACKAGE

This doc has information about steps to setup octeontx platform and information about common offload hw block drivers of **Cavium OCTEONTX** SoC family.

More information about SoC can be found at Cavium, Inc Official Website.

1.1 Common Offload HW Block Drivers

1. **Eventdev Driver** See :doc: *../eventdevs/octeontx.rst* for octeontx ssovf eventdev driver information.

2. **Mempool Driver** See :doc: *../mempool/octeontx.rst* for octeontx fpavf mempool driver information.

1.2 Steps To Setup Platform

There are three main pre-prerequisites for setting up Platform drivers on OCTEONTX compatible board:

1. **OCTEONTX Linux kernel PF driver for Network acceleration HW blocks**

   The OCTEONTX Linux kernel drivers (includes the required PF driver for the Platform drivers) are available on Github at octeontx-kmod along with build, install and dpdk usage instructions.

2. **ARM64 Tool Chain**

   For example, the *aarch64* Linaro Toolchain, which can be obtained from here.

3. **Rootfile system**

   Any *aarch64* supporting filesystem can be used. For example, Ubuntu 15.10 (Wily) or 16.04 LTS (Xenial) userland which can be obtained from http://cdimage.ubuntu.com/ubuntu-base/releases/16.04/release/ubuntu-base-16.04.1-base-arm64.tar.gz.

   As an alternative method, Platform drivers can also be executed using images provided as part of SDK from Cavium. The SDK includes all the above prerequisites necessary to bring up a OCTEONTX board.

   SDK and related information can be obtained from: Cavium support site.

• Follow the DPDK :doc: *../linux_gsg/index.rst* to setup the basic DPDK environment.