

PINS

Introduction

P4 Integrated Network Stack (PINS) is an industry collaboration bringing SDN capabilities and P4 programmability to traditional routing devices that rely on embedded control protocols (like BGP). Specifically, this project uses P4 to model the SAI pipeline, adds externally programmable extensions to the pipeline and introduces P4Runtime as a new control plane interface for controlling the pipeline.

Read more at [PINS webpage](#). PINS [design documents](#) will be available as part of the SONiC documentation.

PINS is open source and available under the Apache 2.0 open source license as part of the [SONiC project](#).

To join the ONF PINS working group, companies are required to submit a [Contributor License Agreement \(CLA\)](#) and a [PINS Project Participant agreement](#).

To learn more, join the PINS community at [sonic-pins-subgroup](#). You can also review the [PINS tutorial](#) to learn the basics or [view a video](#) which highlights the PINS architecture, design and features presented by Google, Intel, and ONF.

Key People and Communication Channels

Project Leads

- Bhagat Janarthanam (bhagatram@google.com)
- Brian O'Connor (brian.oconnor@intel.com)

Mailing Lists

- For PINS announcements, you can join the PINS Announce mailing list here: <https://groups.google.com/a/opennetworking.org/g/pins-announce/about>

Be sure to click the "**Join group**" button near the top of the page near the search bar.

Slack Channel

Community/Project Meetings

- Member's Only weekly working group calls are on Wednesdays for PINS members. Public community calls will begin later in 2021.

Google Drive

Participate & Contribute

CLA

To contribute to PINS, both individuals and companies are required to submit a [Contributor License Agreement \(CLA\)](#).

Jira Board

Repositories

The set of repos that constitute a release can be found in the Release Notes for each release on our Documentation site (see below). A few key repos are listed here

Docs

- Documentation site

We expect all ONF employees, member companies, and participants to abide by our [Code of Conduct](#). If you have any questions or concerns, please notify a member of the ONF team or email conduct@opennetworking.org.



Having trouble getting started? First, reach out to the mailing list or Slack team. If you still have questions or concerns, please email help@opennetworking.org.