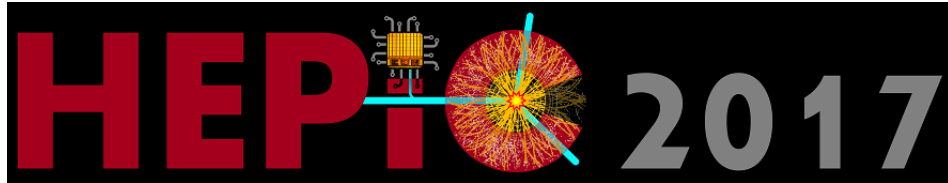


# HEP-IC Workshop 2017



## Report of Contributions

Contribution ID: 0

Type: **not specified**

# Welcome

*Wednesday, 4 October 2017 08:30 (10 minutes)*

**Presenter:** Dr HALLER, gunther (slac)

**Session Classification:** Welcom and Introduction

Contribution ID: 1

Type: **not specified**

## Purpose of the meeting

*Wednesday, 4 October 2017 08:40 (15 minutes)*

**Presenter:** ROE, Natalie (Lawrence Berkeley National Lab)

**Session Classification:** Welcom and Introduction

Contribution ID: 2

Type: **not specified**

## Argonne National Laboratory

*Wednesday, 4 October 2017 08:55 (20 minutes)*

**Presenter:** DRAKE, Gary (Argonne National Laboratory)

**Session Classification:** Overview of group's activities

Contribution ID: 3

Type: **not specified**

## Brookhaven National Laboratory

*Wednesday, 4 October 2017 09:15 (20 minutes)*

**Presenter:** Dr LI, Shaorui (BNL)

**Session Classification:** Overview of group's activities

Contribution ID: 4

Type: **not specified**

## Columbia University

*Wednesday, 4 October 2017 09:35 (20 minutes)*

**Presenter:** Prof. BROOIJMANS, Gustaaf (Columbia University)

**Session Classification:** Overview of group's activities

Contribution ID: 5

Type: **not specified**

## Fermilab National Laboratory

*Wednesday, 4 October 2017 09:55 (20 minutes)*

**Presenter:** Dr DEPTUCH, Gregory (FERMILAB PPD/EED)

**Session Classification:** Overview of group's activities

Contribution ID: 6

Type: **not specified**

## University of Hawaii

*Wednesday, 4 October 2017 10:35 (20 minutes)*

**Presenter:** Prof. VARNER, Gary (University of Hawaii)

**Session Classification:** Overview of group's activities

Contribution ID: 7

Type: **not specified**

## UC Irvine

*Wednesday, 4 October 2017 10:55 (20 minutes)*

**Presenter:** KLEINFELDER, Stuart (UC Irvine)

**Session Classification:** Overview of group's activities

Contribution ID: 8

Type: **not specified**

## Lawrence Berkeley National Laboratory

*Wednesday, 4 October 2017 11:15 (20 minutes)*

**Presenter:** Dr GRACE, Carl (Lawrence Berkeley National Laboratory)

**Session Classification:** Overview of group's activities

Contribution ID: 9

Type: **not specified**

## Michigan University

*Wednesday, 4 October 2017 11:35 (20 minutes)*

**Presenter:** Mr WANG, Jinhong (University of Michigan)

**Session Classification:** Overview of group's activities

Contribution ID: **10**

Type: **not specified**

## **Penn University**

*Wednesday, 4 October 2017 11:55 (20 minutes)*

**Presenter:** Mr NEWCOMER, Mitch (U.Penn)

**Session Classification:** Overview of group's activities

Contribution ID: **11**

Type: **not specified**

## UC Santa Barbara

*Wednesday, 4 October 2017 13:15 (20 minutes)*

**Presenter:** Prof. BREWER, Forrest (UC Santa Barbara)

**Session Classification:** Overview of group's activities

Contribution ID: **12**

Type: **not specified**

## UC Santa Cruz

*Wednesday, 4 October 2017 13:35 (20 minutes)*

**Presenter:** Dr GRABAS, Herve (University of California, Santa Cruz)

**Session Classification:** Overview of group's activities

Contribution ID: **13**

Type: **not specified**

## **SLAC National Accelerator Laboratory**

*Wednesday, 4 October 2017 13:55 (20 minutes)*

**Presenter:** DRAGONE, Angelo (SLAC)

**Session Classification:** Overview of group's activities

Contribution ID: 14

Type: **not specified**

## SMU EE Department

*Wednesday, 4 October 2017 14:15 (20 minutes)*

**Presenter:** Prof. GUI, Ping (SMU)

**Session Classification:** Overview of group's activities

Contribution ID: 15

Type: **not specified**

## SMU Physics Department

*Wednesday, 4 October 2017 14:35 (20 minutes)*

**Presenter:** YE, Jingbo (SMU)

**Session Classification:** Overview of group's activities

Contribution ID: **16**

Type: **not specified**

## UT Austin

*Wednesday, 4 October 2017 14:55 (20 minutes)*

**Presenter:** Prof. ANDEEN, Tim (U Texas, Austin)

**Session Classification:** Overview of group's activities

Contribution ID: 17

Type: **not specified**

## Introduction

*Wednesday, 4 October 2017 15:35 (10 minutes)*

**Presenter:** Dr DEPTUCH, Gregory (FERMILAB PPD/EED)

**Session Classification:** Collaborating between institutions

Contribution ID: **18**

Type: **not specified**

## **Collaborating between institutions: the CERN experience**

*Wednesday, 4 October 2017 15:45 (20 minutes)*

**Presenter:** CAMPBELL, Michael (CERN)

**Session Classification:** Collaborating between institutions

Contribution ID: **19**

Type: **not specified**

## Sharing databases: Cliosoft Tools

*Wednesday, 4 October 2017 16:05 (30 minutes)*

**Presenter:** Mr VARDE, Amit (Cliosoft)

**Session Classification:** Collaborating between institutions

Contribution ID: **20**

Type: **not specified**

## Roundtable

*Wednesday, 4 October 2017 16:35 (1 hour)*

**Presenter:** Dr DEPTUCH, Gregory (FERMILAB PPD/EED)

**Session Classification:** Collaborating between institutions

Contribution ID: **21**

Type: **not specified**

## Introduction

*Thursday, 5 October 2017 08:30 (10 minutes)*

**Presenter:** O'CONNOR, Paul (BNL)

**Session Classification:** New developments, trends and plans

Contribution ID: 22

Type: **not specified**

## Digital-on-top Mixed Signal Design

*Thursday, 5 October 2017 08:40 (20 minutes)*

**Presenter:** HOROWITZ, Mark (Stanford University)

**Session Classification:** New developments, trends and plans

Contribution ID: 23

Type: **not specified**

## **Trends in pixel readout chip designs for high rate and radiation**

*Thursday, 5 October 2017 09:00 (20 minutes)*

**Presenter:** GARCIA-SCIVERES, Maurice (LBNL)

**Session Classification:** New developments, trends and plans

Contribution ID: 24

Type: **not specified**

## Precision Timing in HEP experiments

*Thursday, 5 October 2017 09:20 (20 minutes)*

**Presenter:** Prof. VARNER, Gary (University of Hawaii)

**Session Classification:** New developments, trends and plans

Contribution ID: 25

Type: **not specified**

## Monolithic Pixels and technologies

**Presenter:** Mr CARAGIULO, Pietro (SLAC National Accelerator Laboratory)

Contribution ID: 26

Type: **not specified**

## Front-end in extreme conditions

*Thursday, 5 October 2017 09:40 (20 minutes)*

**Presenter:** Dr LI, Shaorui (BNL)

**Session Classification:** New developments, trends and plans

Contribution ID: 27

Type: **not specified**

## **Rad-hard methodology and cad tools**

*Thursday, 5 October 2017 10:00 (20 minutes)*

**Presenter:** MIRYALA, Sandeep

**Session Classification:** New developments, trends and plans

Contribution ID: 28

Type: **not specified**

## **Advanced Interconnections between Sensors and Integrated Circuits**

*Thursday, 5 October 2017 10:40 (20 minutes)*

**Presenter:** KENNEY, Chris (SLAC)

**Session Classification:** New developments, trends and plans

Contribution ID: 29

Type: **not specified**

## 3D-IC status and trends

*Thursday, 5 October 2017 11:00 (20 minutes)*

**Presenter:** Dr LIPTON, Ronald (Fermilab)

**Session Classification:** New developments, trends and plans

Contribution ID: **30**

Type: **not specified**

## **Content addressable memories for HEP**

*Thursday, 5 October 2017 11:20 (20 minutes)*

**Presenter:** Dr LIU, Ted (Fermilab)

**Session Classification:** New developments, trends and plans

Contribution ID: 31

Type: **not specified**

## Information-centric analog interfaces

*Thursday, 5 October 2017 11:40 (20 minutes)*

**Presenter:** MURMANN, Boris (Stanford University)

**Session Classification:** New developments, trends and plans

Contribution ID: 32

Type: **not specified**

## **Cadence: trends in CAD tools and services**

*Thursday, 5 October 2017 13:00 (20 minutes)*

**Presenter:** NIZIC, Mladen (Cadence)

**Session Classification:** New developments, trends and plans

Contribution ID: 33

Type: **not specified**

## MOSIS technology Roadmap

*Thursday, 5 October 2017 13:20 (20 minutes)*

**Presenter:** Mr PINA, Russ (MOSIS Service)

**Session Classification:** New developments, trends and plans

Contribution ID: **34**

Type: **not specified**

## Roundtable

*Thursday, 5 October 2017 13:40 (1 hour)*

**Presenter:** O'CONNOR, Paul (BNL)

**Session Classification:** New developments, trends and plans

Contribution ID: 35

Type: **not specified**

## Introduction

*Thursday, 5 October 2017 15:00 (10 minutes)*

**Presenter:** DRAGONE, Angelo (SLAC)

**Session Classification:** Collaborations and partnership with other research agencies and industry

Contribution ID: 36

Type: **not specified**

## Working with National Labs

*Thursday, 5 October 2017 15:10 (20 minutes)*

**Presenter:** WILLARDSON, Mike (SLAC)

**Session Classification:** Collaborations and partnership with other research agencies and industry

Contribution ID: 37

Type: **not specified**

## Roundtable

*Thursday, 5 October 2017 15:30 (1 hour)*

**Presenter:** DRAGONE, Angelo (SLAC)

**Session Classification:** Collaborations and partnership with other research agencies and industry

Contribution ID: **38**

Type: **not specified**

## Introduction

*Friday, 6 October 2017 08:30 (10 minutes)*

**Presenter:** Mr NEWCOMER, Mitch (U.Penn)

**Session Classification:** New collaborations and training initiatives

Contribution ID: 39

Type: **not specified**

## **Cross-institutional training and continuous education in ASIC design**

*Friday, 6 October 2017 08:40 (20 minutes)*

**Presenter:** Dr HOFF, Jim (Fermilab)

**Session Classification:** New collaborations and training initiatives

Contribution ID: **40**

Type: **not specified**

## Round of proposals

*Friday, 6 October 2017 09:00 (1 hour)*

**Presenter:** Mr NEWCOMER, Mitch (U.Penn)

**Session Classification:** New collaborations and training initiatives

Contribution ID: 41

Type: **not specified**

## Roundtable

*Friday, 6 October 2017 10:20 (45 minutes)*

**Presenter:** Mr NEWCOMER, Mitch (U.Penn)

**Session Classification:** New collaborations and training initiatives

Contribution ID: 42

Type: **not specified**

## Introduction

*Friday, 6 October 2017 11:05 (10 minutes)*

**Presenter:** Dr GRACE, Carl (Lawrence Berkeley National Laboratory)

**Session Classification:** HEP IP database

Contribution ID: 43

Type: **not specified**

## Round of proposals

*Friday, 6 October 2017 11:15 (1 hour)*

**Presenter:** Dr GRACE, Carl (Lawrence Berkeley National Laboratory)

**Session Classification:** HEP IP database

Contribution ID: 44

Type: **not specified**

## Roundtable

*Friday, 6 October 2017 12:15 (45 minutes)*

**Presenter:** Dr GRACE, Carl (Lawrence Berkeley National Laboratory)

**Session Classification:** HEP IP database

Contribution ID: 45

Type: **not specified**

## Summary and guidelines for the report

*Friday, 6 October 2017 13:00 (20 minutes)*

**Presenter:** DRAGONE, Angelo (SLAC)

**Session Classification:** Closeout