



International Workshop on Phased Array Antenna Systems for Radio Astronomy

Brigham Young University, Provo, Utah, USA
May 3–5, 2010

Phased array feeds and aperture arrays are transitioning from research to development for synthesis imaging instruments, Square Kilometre Array (SKA) Pathfinders, and large single-reflector telescopes. Previous workshops and symposia have played an important role in formulating science requirements, standardizing performance metrics, and accelerating progress through strong international collaborations. As part of this successful series of topical meetings, Brigham Young University announces a workshop on phased array antenna systems for radio astronomy to be held May 3–5, 2010, in Provo, Utah, USA.

Organizing Committee

General Chair:

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Technical Program Chair:

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Workshop URL: <http://ce.byu.edu/cw/radio/>

Topics

- Square Kilometre Array (SKA) Pathfinders, progress updates, and PrepSKA issues
- Phased array feeds for large reflectors
- Science requirements for single dishes and interferometers
- System noise temperature reduction
- Array element and system design optimization
- Calibration and beamforming
- Polarization discrimination
- Imaging algorithms
- Dynamic range
- Array signal processing and back-ends
- Signal transport infrastructure
- Cryogenic arrays
- Cost reduction
- Power consumption and EMC

Important Dates

January 29, 2010 Abstract submission deadline

March 1, 2010 Early registration

April 1, 2010 Registration

May 3–5, 2010 Workshop

A limited number of travel grants may be available. Contact the organizers for more information.

Format

The workshop technical program will consist of a single session track of oral paper presentations and group discussion periods. The program will focus primarily on critical-path issues for phased array research and development, but will also include tutorial presentations on phased array antenna design, figures of merit, and array signal processing.

Abstract Submission

For attendees who wish to give an oral presentation at the workshop, a one-page title and abstract in pdf format must be submitted electronically by **January 29, 2010**. See the conference Web site for formatting and submission instructions (<http://ce.byu.edu/cw/radio/>). A limited number of longer papers or other documents of interest may also be submitted for distribution to all attendees as part of the workshop packet.

Social Program

Western-style barbecue banquet, May 4
Informal Utah National Park trip, May 6–7

Sponsored by the BYU Radio Astronomy Systems Research Group (<http://www.ee.byu.edu/ras>) and Center for Smart Antenna Systems (CSAS) (<http://csas.ee.byu.edu>).

