

*Welcome!*

JAMS/AMTAS Fall 2015 Meeting

Intellectual House  
University of Washington

4 November 2015

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  - The meeting agenda, list of attendees, and a flyer/invitation from UW Schl of Business are available at the registration desk:
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    - Flyer: a collaborative cohort-based program intended for small/medium sized aerospace companies is being organized by UW Foster School of Business
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# AMTAS Updates

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## Background and Status

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# The FAA Center of Excellence Program

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- FAA CoE program was initiated in 1990
  - Administered by Dr. Patricia Watts of the W. J. Hughes Research Center (Atlantic City, New Jersey)
  - Eleven CoEs have been established since 1990
  - Seven CoEs are currently active:  
[www.faa.gov/go/coe](http://www.faa.gov/go/coe)
  - CoE's are funded in three "Phases," nominally over a total period of 3-10 yrs
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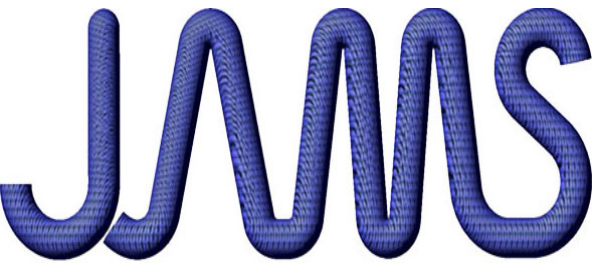


# JAMS-AMTAS-CECAM

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- The FAA Joint Advanced Materials and Structures (JAMS) Center of Excellence was formed in 2004 and consists of two university teams:
    - AMTAS ('A'dvanced 'M'aterials in 'T'ransport 'A'ircraft 'S'tructures)
    - CECAM ('Ce'nter for 'C'omposites and 'A'dvanced 'M'aterials)
  - Curt Davies serves as JAMS Program Manager (W. J. Hughes Research Center, Atlantic City NJ)
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# JAMS CoE Member Schools

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## AMTAS (Advanced Materials for Transport Aircraft Structures)

- University of Washington, Lead
- Washington State University
- Oregon State University
- Edmonds Community College
- Florida International University
- University of Utah



## CECAM (Center for Composites and Advanced Materials)

- Wichita State University, Lead
- Northwestern University
- Purdue University
- Tuskegee University
- University of Delaware
- University of California at Los Angeles





# JAMS-AMTAS-CECAM

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- JAMS-AMTAS-CECAM is now in Phase III, scheduled to conclude 15 December 2015
  - Current FAA plans (as per Nov 3 conversation with Curt Davies):
    - Extend current JAMS-AMTAS-CECAM COE to 15 December 2017
    - Competition to establish a new COE will be announced in early 2017...new center will have broader technical scope, although primary focus will remain advanced materials
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# JAMS/AMTAS Administration

## *FAA personnel*

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- Patricia Watts, CoE National Program Director (W. J. Hughes Research Center, Atlantic City, NJ)
  - Curt Davies, JAMS Program Manager (W. J. Hughes Research Center, Atlantic City NJ)
  - FAA Technical Monitors – AMTAS projects (Hughes Res Ctr): Allan Abramowitz, Curt Davies, Dave Galella, Lynn Pham, Dave Westlund
  - Larry Ilcewicz, FAA CSTA Advanced Composites, Renton, WA: helps guide all AMTAS projects
  - Cindy Ashforth, Program Manager, Renton, WA: helps guide FAA Safety Awareness Course Development
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# JAMS/AMTAS Administration *UW Personnel*

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Prof. Mark Tuttle, AMTAS Director

Prof. Kuen Lin, AMTAS Co-Director

Ms. Ellen Barker, Assistant to the Director

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# JAMS/AMTAS Meetings

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- Annual JAMS meetings
    - Held during spring (~ March-June)
    - Speakers from all 12 JAMS universities
    - The two lead universities (UW and WiSU) alternate as hosts
    - 2015 JAMS Meeting was hosted by WiSU, held in conjunction with AA&S conference, 31 March – 1 April, Baltimore
    - 2016 JAMS Meeting will be hosted by UW, in conjunction with AA&S conference, 21-24 March, Grapevine, TX
  - Annual AMTAS meetings
    - One-day mtg, held during autumn (~ Oct-Nov) in the Pacific Northwest
    - Speakers drawn from AMTAS universities, industry, FAA
    - 67 registrants for today's meeting
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# JAMS/AMTAS Meetings

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- Agendas and presentations from all past JAMS-AMTAS meetings are available from the AMTAS website:

<http://depts.washington.edu/amtas/>

(follow link to “Events”)

- Summary and presentations from the meeting today will be posted sometime next week (Ellen will send e-mail when site is updated)
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# Special thanks to..

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- The Boeing Company 
  - Our many additional industrial partners, particularly
    - Hexcel Corporation 
    - Cytec 
    - Toray 
    - Bell Helicopters 
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# Special thanks to..

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- The University of Washington:
    - Provost Office (Vice Provost Mary Lidstrom)
    - College of Engineering (Dean Michael Bragg)
    - Department of Aeronautics and Astronautics  
(Chair Tony Waas)
    - Department of Materials Science and Engineering  
(Chair Alex Jen)
    - Department of Mechanical Engineering  
(Chair Per Reinhall)
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# Meeting Agenda is Intended to Foster Discussion (*use Session I to illustrate*)

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- 9:15-11:00 am: Session I

9:15–9:35	Failure of Notched Laminates under Out-of-Plane Bending	Mitchell Daniels Oregon State U
9:35–9:40	<i>Discussion</i>	
9:40–10:00	Evaluation of Notch Sensitivity of Composite Sandwich Structures	Marcus Stanfield Univ Utah
10:00–10:05	<i>Discussion</i>	
10:05–10:25	Effects of Moisture Diffusion in Sandwich Composites	Mark Tuttle Univ Washington
10:25–10:30	<i>Discussion</i>	
10:30–11:00	<i>Industry Feedback</i>	Kaz Karayev The Boeing Co.

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- Please participate in the discussion throughout the day!!!
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  - Comments or Questions before we begin?
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**Thanks for attending!**

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