



EFDA

EUROPEAN FUSION DEVELOPMENT AGREEMENT

Task Force
INTEGRATED TOKAMAK MODELLING

Remote meeting, 24 November 2010

INTEGRATED SCENARIO MODELLING, Introduction meeting 24 November

**Presented by X LITAUDON & I
VOITSEKOVITCH**

TF Leader : G. Falchetto
Deputies: R. Coelho, D. Coster

EFDA CSU Contact Person: D. Kalupin

Agenda

- **Detailed preparation of the working session at Culham: agreement on tasks, participants**

Remote meeting

**Regular remote meeting on Wednesday morning
10h30-12h00 CET (09h30-11h00 GMT) :**

- **Wednesday 24/11 10h30-12h00 CET**
 - Preparation of working session
- **Wed 08/12 10h30-12h00 CET**
 - Wrap-up from the working session
- **Thursday 09/12 14h00-15h Presentation of Y. Kamada-san on JT-60SA (with video-conference from IRFM)**

ISM Working session

- **ISM working session date and place have been confirmed**
 - 29 nov- 03 Dec. , At Culham
 - I Voitsekovitch as Local Organiser
- **Participants :**
 - CCFE: P. Belo, L. Garzotti, D. Harting, J. Lonnroth, F. Koechl, I. Voitsekhovitch, V. Parail, I. Nunes
 - CEA: J. Garcia, E. Joffrin , X. Litaudon , E. Nardon, M. Schneider,
 - IPP: J. Hobirk
 - FOM: J. Citrin, D. Hogeweij,
 - FZ-Juelich: S Wiesen
 - ITER-IO Th Casper

Working sessions- Planning

- **Monday 10h-12h**
 - Introduction
 - JET current ramp down experiments I. Nunes
 - JET hybrid experiments for ISM modelling E. Joffrin
- **Tuesday 14h-16h**
 - Reports/discussion on D-T hybrid modelling for JET
- **Wednesday 16h**
 - EPED parameters for ITER hybrid ? : X. Litaudon
- **Thursday**
- **Friday**
- **Daily progress report**
 - Wed-Thursday 16:00 pm (with coffee !)
 - Friday 11:00 am (with coffee!)
- **Wednesday : 18h30 Social drink in Abingdon pub!**

Working group Act 1

- **ISM-P1-2010-4 Verification of equilibrium solver and PFDE in ETS Coupling of free boundary equilibrium code and transport code –**
 - how is it done in CORSICA?"
 - informal discussion, I. Voitsekhovitch, T. Casper, V. Parail, F. Koechl, G. Corrigan, V. Drozdov, L. Appel, D. McDonald, E. Nardon

Working group Act 2

- **ISM-P2-2010-1 JET DT extrapolation of the hybrid regime, effect of rotation**
 - J Garcia, I. Voitsekovitch, G. Sips, C. Challis, I. Jenkins, I. Nunes, H. Weissen
- **ISM-P2-2010-06 Modelling of JET current ramp down experiments**
 - V. Parail, J. Lonnroth, Isabel Nunes, P. Belo (H to L transition, edge modelling), J. Artaud (Metis for validation)
- **ISM-P2-2010-07 Current profile diffusion in JET hybrid scenario:**
 - J. Citrin, F. Koech, J Garcia, D Hogeweij, E. Joffrin, I. Voitsekhovitch, P. Belo for impurity during ramp up
- **ISM-P2-2010-08 ASDEX interpretative hybrid modelling**
 - M Schneider, J Hobirk, J Citrin
- **ISM-P2-2010-4 Modelling of DIII-D current ramp up discharges (ITPA database) comparison ASTRA/CORSICA Copi-Tang & Bohm/GBohm**
 - I Voitsekhovitch, T Casper

Working group Act 3

- **ISM-P3-2010-06, Hybrid scenario with revised ITER ECRH antenna configuration**
 - 0-D modelling with METIS E. Nardon with help J. Garcia, J. Citrin, J. F. Artaud (remote), J. Johner (HELIOS, remote)
- **ISM-P3-2010-08 Integrated modelling of ITER H-mode scenario including impurities**
 - S. Wiesen, P. Belo, F. Koechl, J. Lonnroth, V. Parail, D. Harting
- **ISM-P3-2010-09 ITER hybrid current ramp-up and free boundary equilibria calculation**
 - D. Hogeweij, F. Imbeaux, F. Koechl, X. Litaudon, T. Casper
- **IMP-P3-2010-10 ITER hybrid MHD stability**
 - J. Lonnroth (+ J. Garcia, J. Citrin) focusing on edge stability and comparison with EPED modelling
- **ISM-P3-2010-02 Modelling of deep pellet fuelling in ITER hybrid regime:**
 - L. Garzotti, F. Koechl, B. Pegourie, JET or ITER?
- **ISM-P3-2010-11 JT60-SA modelling 0-D modelling:**
 - S. Wiesen, X. Litaudon (0-D modelling), J. F. Artaud (remote) , J. Johner (HELIOS, remote)