

# REPORT

## of the CCTF Working Group on the International Atomic Time

Patrizia Tavella

## Aim of TAI WG

- to examine the remarks and requirements expressed by the users of the service of TAI,
- to prepare guidelines for the improvement of the service of TAI



1. Organising a meeting of the laboratories contributing to TAI (VII meeting on Sept 12 – 13, 2006)
2. Establishing temporary Study Groups for addressing specific topics
3. Collaboration with the other CCTF WG for harmonising the different contributions to TAI

# 1. VII meeting of the laboratories contributing to TAI (Sept 12-13, 2006)

Attending people  71

N. laboratories  35

N. countries  27

# 1. VII meeting of the laboratories contributing to TAI (Sept 12-13, 2006)

- Possible frequency drift of commercial Cs clock yields to EAL frequency drift



needs of stable environmental conditions in the laboratory

- Increasing and promising use of GPS geodetic receiver for time transfer



draft recommendation

- Evaluation of the uncertainty UTC-UTC(k)



correlation and comparison uncertainty small inside the labs  
calibration uncertainty often the most important  
(see other WG Rec: CGGTTS and MRA)

- Fluent and correct data communication to the BIPM of utmost importance



additional effort for improvement

## 2. Establishing temporary Study Groups for addressing specific topics

Two SGs formed in Aug 2005 for the evaluation of:

- Use of GPS *All in View* technique in TAI,  
Chair: Judah Levine, NIST
- TAI Link Optimization,  
Chair: Demetrios Matsakis, USNO

The SGs will report to the CCTF

### 3. Collaboration with the other CCTF WG for harmonising the different contributions to TAI

All the other CCTF WGs invited and contributing

Also additional Groups contribution  
(IGS clock product, ITU SRG on leap second,...)

# Activity of the sub Group on "Algorithms"



**I.N.R.I.M.**  
ISTITUTO NAZIONALE DI RICERCA  
METROLOGICA  
Torino (Italy)



# Fifth International Symposium on Time Scale Algorithms

March 2008 at  
Real Observatorio de la Armada  
San Fernando, Spain

Call for ideas  
invited speakers  
tutorials

*Organized by the CCTF sub-WG on Algorithms  
chaired by Patrizia Tavella INRIM,  
in collaboration with Felicitas Arias BIPM, Juan Palacio ROA,  
and Demetrios Matsakis USNO*

Proposal for updating the membership  
and terms of reference of the  
CCTF Working Group on TAI  
(draft recommendation)