

SOLAR-B <b>E I S</b>  EUV IMAGING SPECTROMETER	<b>Consortium Meeting</b>  <b>EIS Design - post US selection</b>  <b>NRL 26-27 Jan 1999</b>  <b>AGENDA</b>
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## Meeting Arrangements

### Time and Place

From 9am Tuesday January 26, 1999, NRL, Washington DC, Bdg 43 (Management information Center) 2<sup>nd</sup> floor

### Affiliation

**Attendee**  
(alphabetical order)

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## Agenda Items

### Day 1 - Tuesday 26th January

#### Introduction

9am. Dr. Timothy Coffey, the NRL Director of Research, will welcome the Solar-B Team.

#### 1. Status

Opening remarks	JLC
Conclusion of the US selection process - what of the NRL proposal is still proposed?	GAD
Kick-off meeting at ISAS, March 99	HH

#### 2. Science

Review of major science goals	JLC/GAD/HH
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The Four Wavebands: Science & Countrates	KPD/LKHM/All
- referring to : line lists with countrates and EIS studies (UK/J) as detailed in "EIS science notes" <a href="http://www.mssl.ucl.ac.uk/solar-b/docs/sci/notes4.html">http://www.mssl.ucl.ac.uk/solar-b/docs/sci/notes4.html</a> and <a href="http://www.mssl.ucl.ac.uk/www_solar/solarb/eis_wave.html">http://www.mssl.ucl.ac.uk/www_solar/solarb/eis_wave.html</a>	

SERTS observations of HeII	JD/
Value of HeII as a transition region line (comments about CDS experience would be welcome)	RAH?

Multilayers at 400 A	JFS
What are the prospects for observations in this region?	

#### 3. Instrument (telescope) configuration

The NRL Cassegrain Telescope/Spectrometer its properties, advantages, and problems)	CK
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<i>Some questions which may arise include ...</i>	
What are the mechanisms and their nature? (e.g. disturbing torques)	NRL
Is there a slit exchange mechanism or a slit/slot?	"
Are there focus adjustment mechanisms?	"
What are the positional tolerances of the components?	"
Is there, or is there a need for, an optical metering subsystem?	"
What does the focal surface of the grating look like?	"
What are the assumed detector properties (pixel size and format)? (Available EEV CCD formats	" MSSL)

The Baseline (aka TRENDY) instrument	HH?
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Other instrumental drivers	
- Filter (Al) transmission curves	JFS
- Calculation of Multilayer reflectances. Performance of real-world ML's	JFS/JD
- Grating configuration (groove reflectivity vs wavelength & order, multiple waveband)	JFS

#### **4. Selection of EIS Science and Instrumentation**

Discussion, with the aim of reaching a decision on the wavebands and telescope type, or at least develop a plan for reaching such a decision by the March meeting in Japan.

All  
Chair - JLC

#### **Day 2 - Wednesday 27<sup>th</sup> January, 1999**

#### **5. Technical Topics**

##### **5.1 Spacecraft resources**

Mass, envelope, power, resonances, telemetry, thermal properties, pointing HH

##### **5.2 Structure**

vacuum vessel or purged ? Summary of tradeoffs SM?  
use of clamshell-protected entrance filter  
materials  
- tolerances  
- outgassing

##### **5.3. Detectors**

CCD detector performance MW  
Progress with breadboard hardware

##### **5.4 Electronics**

System block diagram MW  
Operating concepts, data flow, processing cycle /HH  
Interface philosophy  
MDP interfaces

##### **5.5. General Topics**

Alignment, Calibration -> Performance Verification Plan All  
Methods of achieving instrument performance - including modelling, subsystem testing and calibration activities

Cleanliness -> Contamination Control Plan - seek LASCO & CDS experience MW/CK?  
Subsystem requirements that flow from contamination control methods

#### **6. Technology Management**

##### **6.1. Management Plans**

Technical coordination in/across institutes MW/All  
Common management plan?  
Common development teams (SDT / IPDT) ?  
Communications:  
- Points of contact,  
- exchange of documents etc.

## 6.2. Technical Coordination

Need to discuss/agree on the following:  
information to be determined during Phase A about each system interface and approximate times (i.e. agree on the format of the interface documents, including the **spacecraft interface control document**).  
System block diagram and interface list, including spacecraft interfaces

## 6.3. Events in the Near-future

Kick-off meeting in Japan.  
Phase A : Scope and duration  
Timing, scope and attendance of Future reviews -  
Requirements Review, Preliminary Design Review

## **7. Resolution of outstanding issues**

7.1 Assignment of hardware responsibilities

7.2. Review of actions etc

7.3. Discussion of schedule

## **8. Conclusion**

8.1. Any other business

8.2. Date of next meeting