# ILC Inputs to ESU

- Two documents defined by Juan and Steinar:
  - General ILC project description: status, situation and physics case (J. Brau coordinator).
  - Description of European participation and capabilities including accelerator and detector&physics activities, (S. Stapnes and J. Fuster coordinators).

### **ESU-ILC Document 1**

- "General ILC project description: status, situation and physics case."
- The deadline, specified by the guidelines for the Update is December 18.
- Draw from full community,
  - editorial team: Jim Brau, Keisuke Fujii,
    Juan Fuster, Christophe Grojean, Benno List,
    Jenny List, Michael Peskin, Junping Tian
- DESY svn repository

### Guidelines

The guidelines define three parts to the submission:

#### Cover page (1 page)

Each document submitted should carry a single cover page containing no more than the title, the contact person(s) and an abstract.

#### **Comprehensive overview (maximum 10 pages)**

This core part of the document must be no more than 10 pages long (excluding the cover page) and must provide a comprehensive and self-contained overview of the proposed input. It should address:

• scientific context, objectives, methodology, readiness and expected challenges.

#### Addendum

A separate addendum is to be provided addressing the following topics (where relevant):

• interested community, timeline, construction and operational costs (if applicable), computing requirements.

# Comprehensive Overview

**Introduction** 1 page Jim and Juan

introduce the ILC250, brief overview of status (technical maturity and TDR, staging, cost analysis, status of political situation)

**Physics** 2 pages Michael, Christophe, Keisuke, Jenny, Junping summary of the impact of the ILC250 physics (also point out potential future through energy extensions)

Collider 2 pages Benno, Shin

summary of the ILC250 design (important to note the elements that are retained in first stage to accommodate future energy extensions)

**Detectors and R&D** 2 pages Ties, Andy

summary of the features of the two validated detectors and the key advances from detector R&D

**Discussion** 2 pages Keisuke, Jim and Juan

discussion of HEP community interest and support, political progress, plan for international realization,

**Summary & Conclusion** 1 page

## Addendum

Chapter title / length in pages / nominated lead authors (to be recruited)

Introduction	5	Brau + Peskin
ILC Machine Design	15	B. List + Michizono
ILC running scenario (w. pol.)	5	J. List
Physics Case (250 GeV)	10	Peskin
Detectors	10	Behnke + White
Physics Simulations: Higgs	20	Tian + J. List
Physics Simulations: Searches	5	Berggren
Program of the ILC beyond 250 G	eV 10	Peskin, Fujii and Vos
Conclusion		
80+ pages		