### CNS

### Expenditure for Construction 1995-2006

Sompact Muon

**CERN-RRB-2007-047** 

Cf. CERN-RRB-2007-024

A. Petrilli, RRB-24, 23 April 2007



- This report gives the detailed and accrued CMS construction cost up to the end of 2006
- Only items present in the breakdown of items of the CMS Construction MoU and its All-Silicon Tracker amendment are included
- For comparison with the MoU, all commitments and payments are given to the detail of Level 3
- All expenditure is reported in current prices whilst the original MoU cost estimate was in 1995 prices (for the Tracker in 2000 prices)



- For the purpose of this report, "commitment" gives the amounts for which a legally binding document has been signed
- The expenditure compiled in this report was, however, gathered from a large number of institutions which follow their own policy of making commitments
- Some institutes prefer to report on "payments" only.
   Their "payments" are shown here as "commitments"
- The total level of "commitments" is therefore likely to be higher than reported here



- 1. This document uses in all tables, including the comparisons of expenditures vs. costs
  - the currently available Funding under MoU and CtC and
  - the Cost Estimates figures as reported in the Status Report (cf. CERN-RRB-2007-023).
  - Available funding will be reviewed in time for the October 2007 RRB
- 2. The Commitments and Payments yearly plots present the foreseen profiles as detailed in the Financial Plan
- 3. The DAQ staging of 1 slice towards the Tracker Integration Facility is explicitly shown in the DAQ and Tracker tables



### Overview of Annex 3 (MCHF)

	1995 -	- 2005	2006		1995 - 2006				
	Comm	Paid	Comm	Paid	Comm	Paid	Comm	Paid	
Totals	475.7	417.6	44.6	67.9	520.3	485.5	95%	89%	

Percentages with respect to the Financial Plan revised Cost Estimates

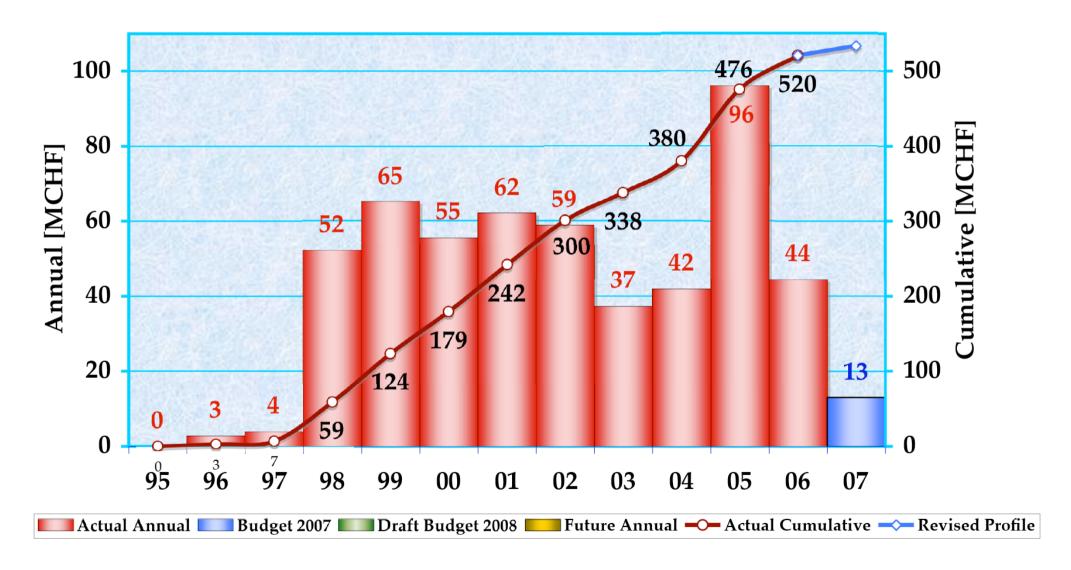


### **Funding Agencies Commitments 1995-2006**

- A large fraction of Funding Agencies had committed most of their funding under MoU and CtC by the end of 2006
- For the remaining ones, commitments are taking place during 2007
- There are no foreseen problems with the MoU and CtC funding
- Step 1, 2 and 3 funding is detailed in the CMS Status Report (cf. CERN-RRB-2007-023)

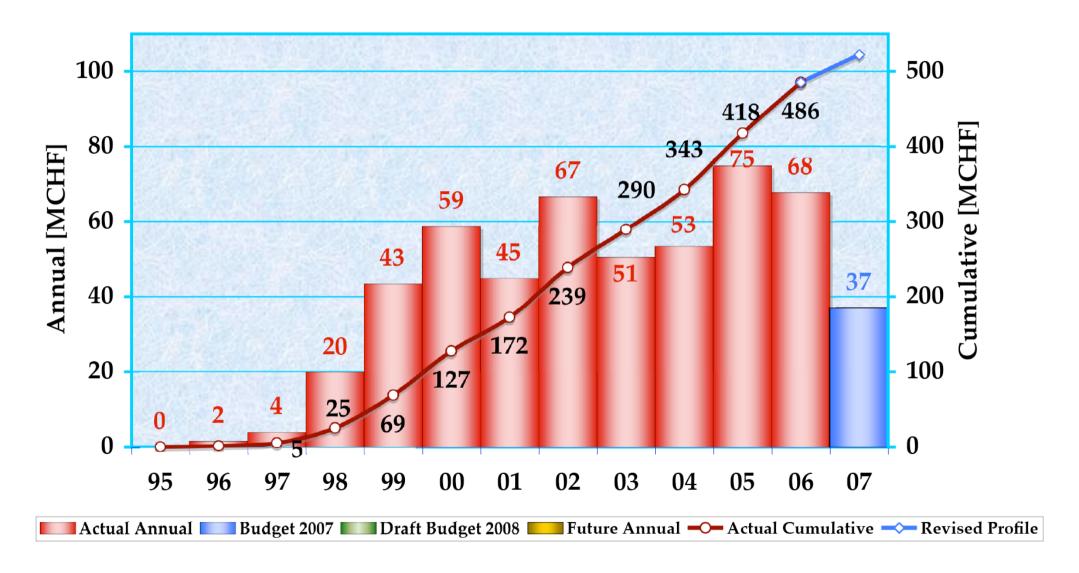


### **Yearly Commitments**





### **Yearly Payments**



8



## Preliminary Draft Budget for Construction 2008

Cf. CERN-RRB-2007-025

A. Petrilli, RRB-24, April 23, 2007



- This document summarizes the preliminary funding requirements for all the payments planned in 2008 to follow the CMS construction schedule
- In 2008, all subdetectors will be in the integration/ commissioning phase



- This document covers requests for all subsystems for funds available under the CMS MoU, Cost to Completion and Step 1 and 2 (cf. Status Report, CERN-RRB-2007-023)
- This preliminary draft budget for the year 2008 is based on the overall planning as presented in the CMS Status Report (cf. CERN-RRB-2007-023)



- The present estimates for all payments in 2008 add up to 10 MCHF
- Together with the payments made by the end of 2006 (486 MCHF) and the 2007 budget planned payments (40 MCHF), the total estimated payments by the end of 2008 would total some 536 MCHF
- This is 100% of the funding requested under MoU,
   CtC and Step 1



- This Preliminary Draft Budget is based on the breakdown of items in the CMS Construction MoU and its All-Silicon Tracker amendment
- As for the past, all figures shown as Payments expected in 2008 are to be considered as best estimates at this time because the actual expenditure will depend, case by case, on commercial tenders received, contract negotiations, currency fluctuations and actual payments during 2007



### **Overview of 2008 Construction Budget (MCHF)**

# All data extracted from Annex 10

Income Expected - Planned Payments	Planned payments	Income expected in 2008 plus funds from 2007	Funds expected to be carried forward from 2007	Common Funds	Tracker Signal	Electromagnetic Calorimeter	Hadron Calorimeter	Muon Detector	Trigger and Data Acquisition	Infrastructure	Commissioning & Integration	TOTALS
кре	d J	om	Fu	-2 .1							<i>-</i> 1.5	-3.6
E)	nne	Inc		-2 .1		1.1			2.8		<i>-</i> 1.5	0.3
me	laı _					7.7			2.8			10.5
nco	<u> </u>			-2 .1		-6.7					-1.5	-10.3



- The present Preliminary Draft Budget is not balanced: some 10.3 MCHF are not covered
- All the Step 1 requested funds are needed to cover the foreseen deficit
- These funds must be committed in 2007 and are needed for payment in 2008 to maintain the construction schedule



### **Summary**

- Annex 10 of CERN-RRB-2007-025 summarizes the Preliminary Draft Budget for 2008 by Funding Agency and by subsystem
- The exact request for 2008 will be presented at the October RRB meeting

The RRB is invited to take note of this preliminary budget request