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| SPIRE/PACS (CEA-SBT) | Monthly Report – July 2005 | Date: August 1 st , 2005 |
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Work Package: Cooler

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| 1. Subsystem Progress Since Project Inception | | |
| FM SPIRE unit delivered. FM PACS unit : Second acceptance program carried out. Pending delivery | | |
| 2. Subsystem Progress This Month | | |
| <ul style="list-style-type: none"> - <i>FM1 (SPIRE)</i> : DRB held Nov. 18th 2004. No comments were provided on EIDP (is considered OK then). - <i>FM2 (PACS)</i> : EIDP is being build up. Delivery has been scheduled with SAp on week 34. - <i>Heat switches</i> : Production of new set in progress (5 “standard” and 5 with new brazing process) - <i>PACS – Level 0 Interface</i> : Work on going. Various prototype straps are being thermally characterized. Manufacturing of very large flexible strap in progress. - <i>FS PACS</i>: has been charged with helium 3. First set of thermal tests using laboratory switches and dummy structure are satisfactory (239 mK with bath at 1.27 K – 255 mK with bath at 1.63 K). The cooler heart was brought back to room temperature and the fill tube was crimped – Measured pressure at 21°C: 8.35 MPa (3% higher than for PACS FM, leading to 6.1 l STP – OK). Cooler was leakchecked (³He) after crimping and again after gluing titanium cap – measured rates $\leq 10^{-10}$ mB.l/s, OK). PACS cooler heart has been removed from test cryostat for integration in flight structure. - <i>FS SPIRE</i>: Cooler heart has been integrated in test cryostat and will be filled middle of August. | | |
| 3. Problem Areas | Remedial Action | |
| Heat switch brazing process | New process to be validated. Plus current process slightly updated. | |
| 4. Engineering Activities | | |
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| 5. Design Changes | | |
| Minor modifications on heat switch parts (play). New interface for level 0 strap : pending validation | | |
| 6. PA/QA Activities | | |
| General QA management. | | |
| 7. Subsystem Management Issues | | |
| None | | |
| 8. Actions Requiring Immediate Attention | | |
| SBT documents approval by SPIRE and PACS projects | | |
| 9. Status of Previous Actions | | |
| None | | |
| 10. Activities Yet to be Achieved | | |
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| 11. Milestones | | Status |
| Mid 2004 | FM assembling | Completed |
| Fall 2004 | FM Acceptance program | Completed |
| Fall 2004 | FM1 SPIRE Delivery | Completed |
| Summer 2005 | FM2 PACS Delivery | Scheduled August (week 34) |
| 2005 | FS program | On going |
| 12. Schedule Changes | | |
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