





SPI Software Process & Infrastructure for LCG

Software Packaging and Distribution

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LCG - Software Process & Infrastructure

Distribution Overview



- Temporary solution
 - local installations (external sites, laptops,...)
 - using simplest approach
 - python downloader + tar format
 - replicate the central AFS tree (in a optimized way)
 - package dependency from SCRAM
- ...until a generic, long-term solution available
- Recently also extended to GRID installation of LCG Application Area software
 - worker nodes with RPM packages



the same principles: <u>copt/sw/lcg</u> tree



Infrastructure



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- Procedures fully automatized via lcg-installation-manager.py
 - get package dependency list from SCRAM
 - generate tar files in AFS tree
 - generate web pages for LCG Soft Web
 - used as a downloader for clients
- Recently added feature:
 - client side RPM building
 - specfile template (easy



CustomizationG - Software Process & J.T. Moscicki CERN



Tools (2)



- Icg-installation-manager.py
 - quite successful for users:
 - POOL @ Karlsruhe
 - BNL nightly builds
 - CMS
 - developers at home
 - ...
 - got interest from other parties
 LCG deployment/certification
 - very easy to use and quite reliable





LCG Soft Main Page



LCG Software Service (CERN LCG SPI) - Konqueror											
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LCG Agenda PI Project POOL Project SEAL Project Simulation Project SPI Project External Links CERN EP Division IT Division LCG LHC	Platforms		LCG projects								
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Project download page



-		LCG Software Service (CERN LCG SPI) - Konqueror	3 - 1)				
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LCG Software	Download page for POOL_1_3_3 / rh73_gcc32							
Home	Automatic download							
External Software	On the machine where you want to install the software run the following command:							
Language order Category order Used in LCG	./lcg-installation-manager.pyproject=POOL_1_3_3arch=rh73_gcc32 prefix=/opt/sw/lcg download							
Projects	Python 2.2 or greater is required. Download the script here: lcg-installation-manager.py							
SPI Quick Links	Questions? Problems? See here.							
SPI Home SPI Index	Manual download							
Projects Portal	POOL_1_3_3LCG_rh73_gcc32.tar.gz							
LCG App. Area	Required packages:							
Home Page		·						
LCG Agenda	name	version	download					
PI Project	SCRAM	V0_19_9	SCRAM_V0_19_9.tar.gz					
POOL Project	uuid	1.32	uuid_1.32LCG_rh73_gcc32.tar.gz					
SEAL Project SPI Project	gccxml	0.4.2_patch1	gccxml_0.4.2_patch1LCG_rh73_gcc32.tar.gz					
	Boost	1.30.2	Boost_1.30.2_LCG_rh73_gcc32.tar.gz					
External Links	mysql++	1.7.9_mysql.4.0.13	mysql++_1.7.9_mysql.4.0.13LCG_rh73_gcc32.tar.gz					



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- Different use-cases should have different solutions
 - Our tool is adequate as a temporary solution for LCG Application Area Distribution
 - but long-term solutions must be investigated:
 - pacman, LCFGng

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- GRID WN installations should be supported differently
- SPI will adopt what LCG Grid Deployment will provide



