

Geant4 Discourse Forum

Dennis Wright (SLAC)

Geant4 Collaboration Meeting

23 September 2019

The Change to Discourse

- Until May 29th the Geant4 user forum was hosted by SLAC HyperNews
 - had been in use since 2001
 - ~4600 subscribers (not all active) at shutdown
- SLAC HyperNews judged to be not secure by SLAC IT
 - required to get rid of it by June 2019
 - no longer any maintainers of basic HyperNews at SLAC
- Geant4 team chose Discourse as replacement
 - Ben Morgan, Gabriele Cosmo, Makoto Asai, Gunter Folger, Alex Howard, Dennis Wright
 - choice approved by steering board

Change-over Plan (1)

- Get private instance of Discourse from CERN IT
 - testing and use of instance by change-over team
 - establish configuration suitable to Geant4
- Make instance public (geant4-forum.web.cern.ch)
 - by Geant4 e-mails, encouraged users to subscribe
 - also sent notice that old HyperNews was closing after a two-week transition period
- Prepare static, read-only version of HyperNews
 - containing all posts up to beginning of transition period
 - static version to be maintained by SLAC indefinitely
 - thanks to SLAC IT for help with this

Change-over Plan (2)

- Link all HyperNews posts to new categories in Discourse
- Close SLAC HyperNews
 - disable posting

Click on “User Forum” in Upper Right-hand Corner of Geant4 Main Page












all categories ▾ **Latest** Top Categories
























Topic		Replies	Views	Activity
Hangs from basic examples running with Qt on Ubuntu 18.04.2 ■ Recording, Visualizing and Persisting Data		0	5	2h
Tally with respect to Angular of Incidence ■ Particles, Track, Event, Run and Biasing		1	5	2h
Help finding aproprite Example? ■ Getting Started		2	38	3h
Installation problem. Visual studio 2019, G4UIQt, LINK2019 ■ Getting Started		3	26	7h
Secondary electron bremsstrahlung x-ray ■ Particles, Track, Event, Run and Biasing		0	4	15h
How to read file .root in Geant4 ■ Ideas and Requirements		4	36	1d
Plot primary energy spectrum ■ Recording, Visualizing and Persisting Data		1	16	1d
Warnings with G4ExtrudedSolids ■ Geometry, Fields and Transportation		3	50	2d
Error in running Example B1 ■ Getting Started		5	71	3d

Click on “Categories” to see all fora (1)

all categories ▾ Latest Top **Categories**

Category	Topics	Latest
News Announcements of Geant4 Releases and Patches will be made here, together with Conferences, Workshops, and Events of interest to the community.	1 / week	<div style="display: flex; align-items: center;">  <div style="margin-left: 10px;"> <p>Hangs from basic examples running with Qt on Ubuntu 18.04.2</p> <p>■ Recording, Visualizing and Persisting Data</p> </div> <div style="margin-left: 20px; text-align: right;"> <p>1 5m</p> </div> </div>
Forum Issues This is an announcement and test area for the Geant4 forum. Forum-wide announcements will appear here from time to time. Please post here questions concerning general forum operation, including sign-up, requests for new fora or problems with access or posting. You may use this area to test-post.	6	<div style="display: flex; align-items: center;">  <div style="margin-left: 10px;"> <p>Tally with respect to Angular of Incidence</p> <p>■ Particles, Track, Event, Run and Biasing</p> </div> <div style="margin-left: 20px; text-align: right;"> <p>1 2h</p> </div> </div>
Getting Started This category covers Geant4 installation, using its example applications, and the toolkit documentation. Before you post, see if your question is answered in Geant4's Installation and Application Developers' Guides . Also check the archived discussion at installation/configuration and examples/docum...	3 / week	<div style="display: flex; align-items: center;">  <div style="margin-left: 10px;"> <p>Help finding aproprite Example?</p> <p>■ Getting Started</p> </div> <div style="margin-left: 20px; text-align: right;"> <p>2 3h</p> </div> </div>
Geometry, Fields and Transportation This category covers the construction of an experiment setup, including its geometry, materials, fields and particle transportation. HyperNews posts in these categories are archived at geometry , fields and transportation .	1 / week	<div style="display: flex; align-items: center;">  <div style="margin-left: 10px;"> <p>Installation problem. Visual studio 2019, G4UIQt, LINK2019</p> <p>■ Getting Started</p> </div> <div style="margin-left: 20px; text-align: right;"> <p>3 7h</p> </div> </div>
Physics Lists This category covers the selection, use and creation of physics lists for your application. Documentation on these topics is provided in the Physics Lists Guide . HyperNews posts in this category are archived at physics lists .	12	<div style="display: flex; align-items: center;">  <div style="margin-left: 10px;"> <p>Secondary electron bremsstrahlung x-ray</p> <p>■ Particles, Track, Event, Run and Biasing</p> </div> <div style="margin-left: 20px; text-align: right;"> <p>0 15h</p> </div> </div>
		<div style="display: flex; align-items: center;">  <div style="margin-left: 10px;"> <p>How to read file .root in Geant4</p> <p>■ Ideas and Requirements</p> </div> <div style="margin-left: 20px; text-align: right;"> <p>4 1d</p> </div> </div>
		<div style="display: flex; align-items: center;">  <div style="margin-left: 10px;"> <p>Plot primary energy spectrum</p> <p>■ Recording, Visualizing and Persisting Data</p> </div> <div style="margin-left: 20px; text-align: right;"> <p>1 1d</p> </div> </div>
		<div style="display: flex; align-items: center;">  <div style="margin-left: 10px;"> <p>Warnings with G4ExtrudedSolids</p> <p>■ Geometry, Fields and Transportation</p> </div> <div style="margin-left: 20px; text-align: right;"> <p>3 2d</p> </div> </div>
		<div style="display: flex; align-items: center;">  <div style="margin-left: 10px;"> <p>Error in running Example B1</p> </div> <div style="margin-left: 20px; text-align: right;"> <p>5 2d</p> </div> </div>

Click on “Categories” to see all fora (2)

<p>Physics Processes, Models and Cross Sections 2 / week</p> <p>This category covers electromagnetic, hadronic, and weak physics processes along with the models and cross sections that implement them. HyperNews posts in these categories are archived at electromagnetic processes, optical photons, hadronic processes, DNA/Very Low Energy physics and fast simulatio...</p>	<p> Getting Started 3d</p>
<p>Particles, Track, Event, Run and Biasing 1 / week</p> <p>This category is for questions on controlling and biasing runs, events, tracks, and particles in a simulation. HyperNews posts in these categories are archived at event and track management, multithreading, particles, run management, biasing and graphical (user) interfaces.</p>	<p> RSim available for download 0  News 3d</p>
<p>Recording, Visualizing and Persisting Data 2 / week</p> <p>This category covers data management in your simulation, including how to score hits and quantities, visualise the detector geometry and hits, and persist results to file. HyperNews posts in these categories are archived at scoring, hits/digitization, visualization, persistency, and analysis.</p>	<p> Style guide for publishing 0  Getting Started 3d</p>
<p>Ideas and Requirements 1 / week</p> <p>Post here if there's a feature you'd like to see implemented in Geant4, or have an idea for the evolution of Geant4. User requirements posted prior to June 2019 are archived under the User requirements category.</p>	<p> G4PVPParameterised Voxelization/Optimization Documentation 0  Geometry, Fields and Transportation 3d</p>
<p>Applications 4</p> <p>Geant4-based applications may be discussed here. These include medical, space, industrial and educational applications, among others. Posts prior to June 2019 are archived under the education, industrial, medical and space categories.</p>	<p> Activation of Synchrotron Radiation process 3  Physics Processes, Models and Cross Sections 3d</p>
	<p> dN/dE meaning..... versus fill histogram 2  Physics Processes, Models and Cross Sections 3d</p>
	<p> Unable to identify error when installing g4py environment 0  Getting Started 3d</p>
	<p> FreeCAD GDML Workbench & Geant Workbench 8  Applications 4d</p>
	<p> C12 ion Bragg peak 0  Physics Processes, Models and Cross Sections 5d</p>
	<p> Problems modifying particle decay table 0  Particles, Track, Event, Run and Biasing 5d</p>
	<p> Integrate field along particle trajectory 0  Recording, Visualizing and Persisting Data 5d</p>
	<p> Geant4 visualization with RayTracerX 5  Recording, Visualizing and Persisting Data 6d</p>

Discourse Features (1)

- CERN Discourse maintained by CERN IT
 - Geant4 responsible for maintaining its own instance
 - membership
 - moderation
 - content
 - configuration (to some extent)
 - access
- Reduce number of fora from 26 to 10
 - based on past use patterns
- Search function that works!
 - magnifying glass icon at top right
 - advanced search also

Discourse Features (2)

- “Hamburger” icon gives drop-down menu for options
 - top right
- Three ways to log in:
 - CERN single log-in
 - GitHub
 - Google account
- Can post and respond from e-mail
 - still need to log in to Discourse, though
- All posts allowed, if by registered users
 - any post may be removed by one of the Geant4 managers

Managers and Moderators

- **Managers:**
 - Makoto Asai, Gabriele Cosmo, Gunter Folger, Alex Howard, Ben Morgan, Marc Verderi, Dennis Wright
 - must approve new member applications
 - may suspend or remove users
 - may flag, change or delete content
 - may appoint moderators
- **Moderators**
 - Vladimir Ivantchenko + all managers
 - can flag, change or delete content within category
 - warn users
 - suspend users

Discourse Status

- Many statistics available to managers:
- 400 users signed up since inception
 - currently averaging 2 new sign-ups per day
- 487 page views per day
- 5.3 posts per day
- Average time to first response: 21 hours

Discourse Help

- Discourse is far more flexible than HyperNews
 - more options, but no “official” documentation
- meta.discourse.org
 - for general Discourse How-To, FAQ and information
- Geant4 Discourse managers and moderators
 - for questions specific to Geant4 Discourse
- CERN IT has been helpful answering questions
 - have to set up ticket, though