



ATLAS EDUCATION AND OUTREACH

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OVERVIEW OF NEW ACTIONS



○ PRINT MATERIALS:

- 3D viewer
- Antimatter booklet
- Pop-up book

○ MULTIMEDIA PIECES:

- ATLAS construction in 1, 3, and 5 minutes
- What we do is not in textbooks (Interview movie)
- Interviews with management and group leaders
- HD Event displays animation
- Standard Model animation done by the winner of the Multimedia contest

○ ATLAS.CH

- New W boson candidate events
- News Ticker with recent stories from CERN, ATLAS, BBC, Le Monde, Times (of London)
- ATLAS Blog and twitter



PRINT MATERIALS: 3D VIEWER



<http://www.atlas.ch/discovery/>



The new ATLAS 3D viewer was inspired by NASA. The novelty is that one can change the images display using the same structure; making this an item that can be reused.

We will post additional slides to be downloaded.

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PRINT MATERIALS : ANTIMATTER AND OTHER MYSTERIES BOOKLET



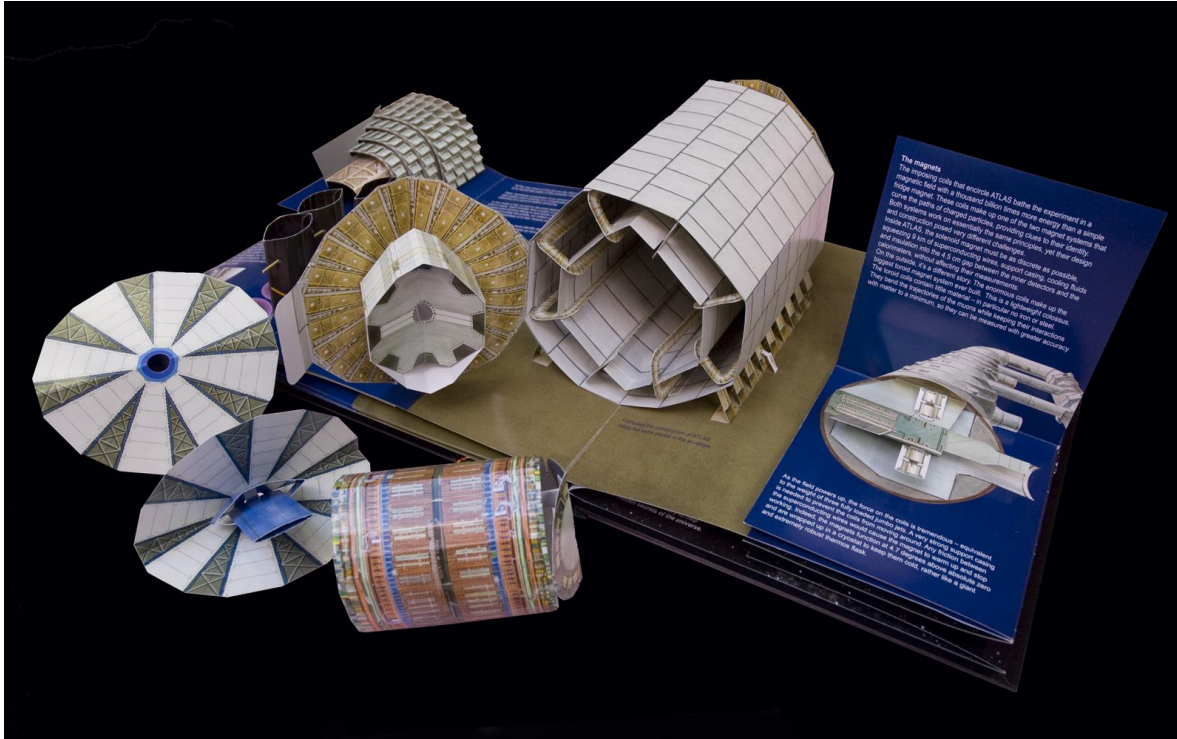
A booklet of 24 pages, rich in graphics containing simple explanations of antimatter, dark matter, String theory and supersymmetry, and extra dimensions.

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PRINT MATERIALS: ATLAS POP-UP BOOK



The ATLAS pop-up book was published last December and has already sold out in UK, where its publisher PAPADAKIS is based. It's second revised edition with a number of improvements will reach 11.000 copies printed.

Several media outlets have released articles about it, including Nature, New Scientist, the Times, Wired, etc.

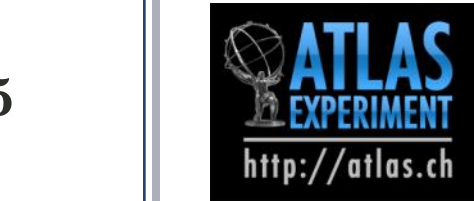
From June it will be available across the States, Canada, Australia and the UK in major bookstores and on Amazon.

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MULTIMEDIA PIECES: ATLAS CONSTRUCTION IN 1, 3, AND 5 MIN



<http://www.atlas.ch/multimedia/html-nc/atlas-built-in-one-minute.html>

We collected all the images recorded over more than 5 years through fixed webcams in the ATLAS cavern and edited a video montage. Available in three versions of 1, 3 or 5 minutes.

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MULTIMEDIA PIECES: WHAT WE DO IS NOT IN TEXT BOOKS



<http://www.atlas.ch/multimedia/html-nc/feature-what-we-do.html>

We interviewed 15 physicists from different backgrounds about their personal points of view on life and what they do. This piece gives a taste to the public of the human diversity of the ATLAS collaboration.

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MULTIMEDIA PIECES: INTERVIEWS WITH MANAGEMENT AND GROUP LEADERS



<http://www.atlas.ch/multimedia/index-interviews.html>



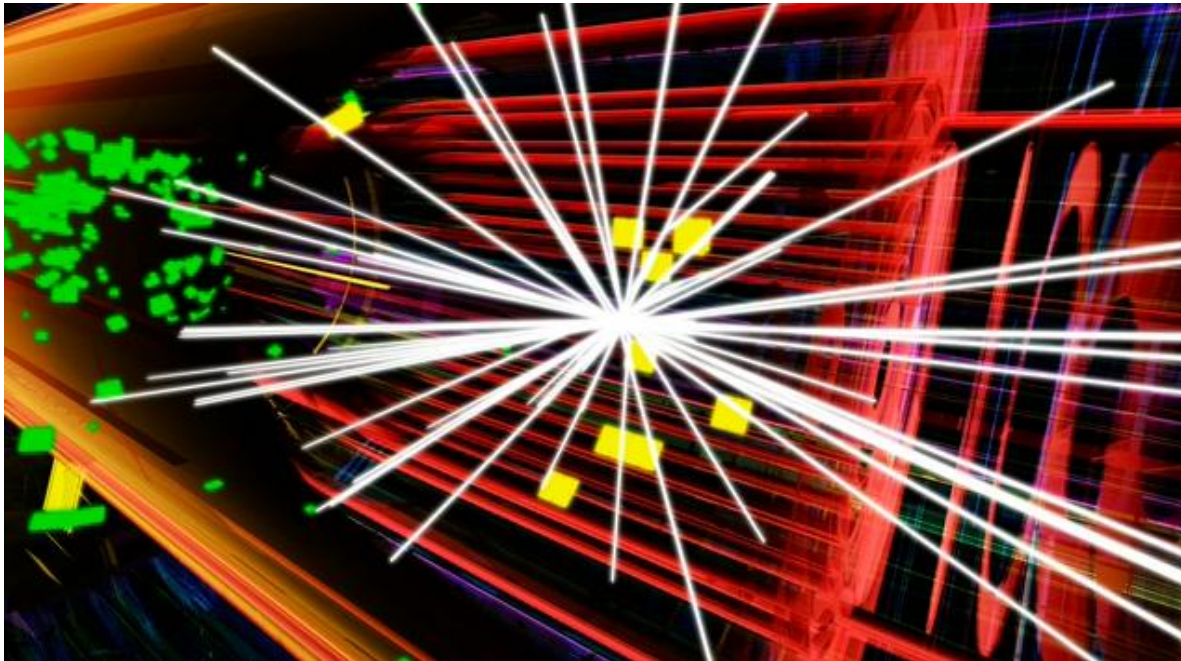
We produced a series of interviews with the ATLAS management and the actual subsystem group leaders in which we explain the complexity of the experiment and why it takes time to obtain important physics results. These interviews were used as part of the ATLAS webcast program on March 30th.

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MULTIMEDIA PIECES: HD ANIMATION OF LATEST EVENT DISPLAY



<http://www.atlas.ch/multimedia/html-nc/animation-7TeV-event.html>



An amazing animation in HD developed by Joao Pequenao on March 30th. This is one of the very first collisions at 7TeV with a muon candidate observed by ATLAS

It was produced within 30 minutes of the actual event portrayed occurred. The new technique used for this opens new possibilities in the way we show real events to the public

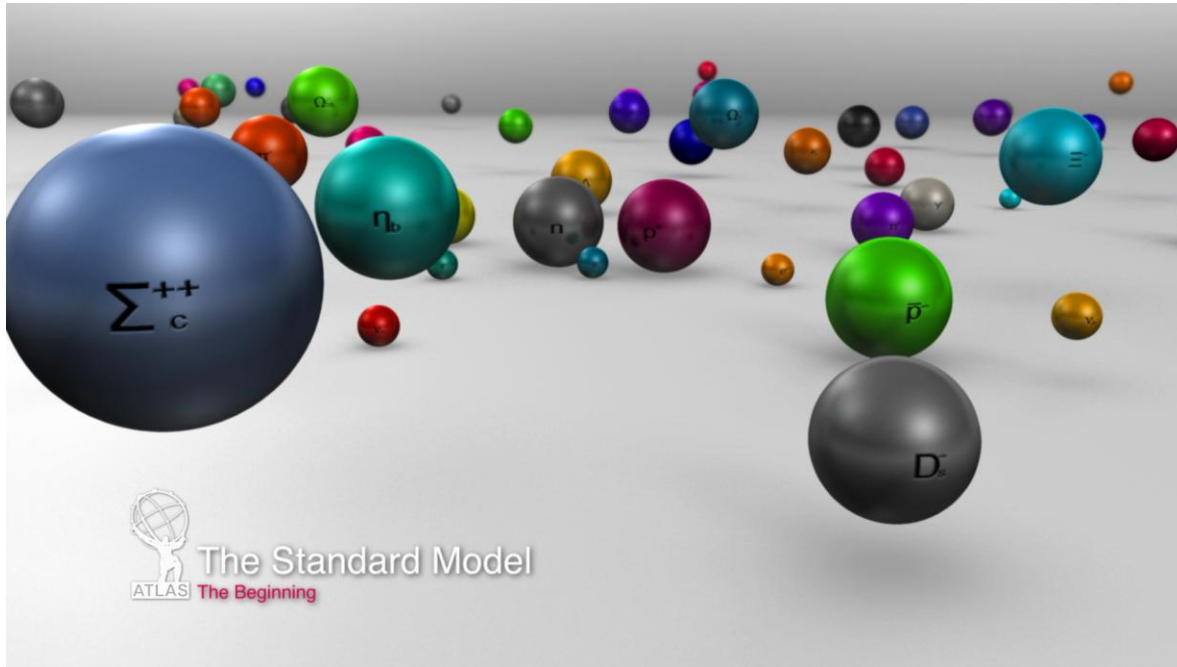
There's a new animation using a variant of this technique showing the last W events in an appealing and comprehensive way.

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MULTIMEDIA PIECES: STANDARD MODEL ANIMATION



<http://www.atlas.ch/contest/index.html#8>



Phil Owen was the winner of the ATLAS multimedia contest, which took place in July 2009.

As a prize Phil spent 3 months with us developing 2 animations for Outreach purposes. One illustrates the Big Bang and the other the Standard Model

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For Press | For Students | For Teachers

ATLAS EXPERIMENT

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BBC: LHC

ATLAS FIRST W BOSON EVENTS



FIRST CANDIDATE EVENT FOR W BOSON TO ELECTRON + NEUTRINO

Beam Status

Cosmic Rays
Epitaxial Halo
Collision

Detector Status

Pixels, SCT, TRT
LAR Cal., Tile Cal., Muon
ON

Magnet Status

Barrel Toroids,
EndCap Toroids,
Solenoid
ON



ANIMATION OF AN ACTUAL 7 TeV COLLISION EVENT

Event Displays | Live Events

About ATLAS

Mapping the Secrets of the Universe
ATLAS is a particle physics experiment at the Large Hadron Collider at CERN. Starting in late 2009/2010, the ATLAS detector will search for new discoveries in the head-on collisions of protons of extraordinarily high energy. ATLAS will learn about the basic forces that have shaped our Universe since the beginning of time and that will determine its fate. Among the possible unknowns are the origin of mass, extra dimensions of space, unification of fundamental forces, and evidence for dark matter candidates in the Universe.

- Potential Discoveries in ATLAS?
- What is the schedule of ATLAS?
- Who are the 3000 physicists in ATLAS?
- What is the LHC?
- How big is ATLAS?
- How much data will be recorded?
- Why is there so much excitement?
- Are students involved?

ATLAS Run Status

Collision energy is 7 TeV (3.5 + 3.5)
Highest luminosity = $1.9 \cdot 10^{27} \text{ cm}^{-2} \text{ s}^{-1}$
Total Collisions (at 7 TeV) = 16,400,000

Latest LHC Runs

Status Plans

ATLAS Blog Follow us on twitter

Also available at YouTube

Features






Most Popular Images







There are many updates on the ATLAS.ch webpage including:

- New W boson candidate events
- News Ticker with recent stories from CERN, ATLAS, BBC, Le Monde, Times (of London)
- ATLAS Blog and twitter

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