

2018 IN PICTURES

From new studies on the Higgs boson to the start-up of antimatter experiments, the inauguration of the Esplanade des Particules and the launch of the update of the European Strategy for Particle Physics, these were just some of the highlights from 2018. Discover more in pictures.



2 & 3 FEBRUARY

CERN's alumni network is officially inaugurated at a major event attended by some 400 participants from all over the world and from all professional backgrounds.

(ALUMNI-PHO-2018-002-77)

8 JANUARY

Lithuania becomes an Associate Member State of CERN, following ratification by its parliament of the corresponding agreement.

(OPEN-PHO-HIST-2017-001-2)



23 JANUARY

Fabiola Gianotti, CERN's Director-General, co-chairs the annual meeting of the World Economic Forum in Davos on the theme "Creating a shared future in a fractured world".

26 & 27 FEBRUARY

Two heads of state visit CERN: Filipe Nyusi, President of Mozambique, and Alexander Van der Bellen, President of Austria.

(CERN-PHOTO-201802-053-23)

(CERN-PHOTO-201802-054-1)



30 MARCH

Beams are back in the LHC, marking the start of its seventh year of operation and the last of Run 2.

(OPEN-PHO-ACCEL-2018-012-01)



1 JUNE

Photographers from all over the world immortalise life behind the scenes at the Laboratory during the *Global Physics Photowalk 2018* competition.

(CERN-PHOTO-201806-132-1)

4 JUNE

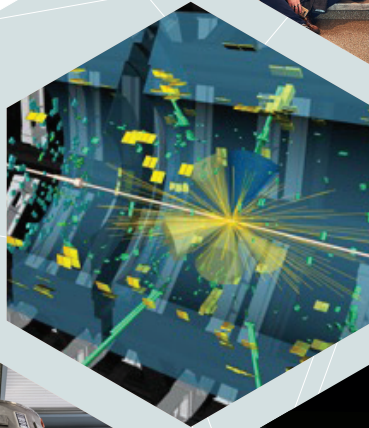
ATLAS and CMS publish the first results on the production of the Higgs boson in association with the most massive elementary particle known, the top quark.

(ATLAS-PHOTO-2019-016-3)

12 JUNE

HALO, an installation designed during an arts residency at CERN and inspired by data from the ATLAS experiment, is displayed at the international contemporary art fair Art Basel.

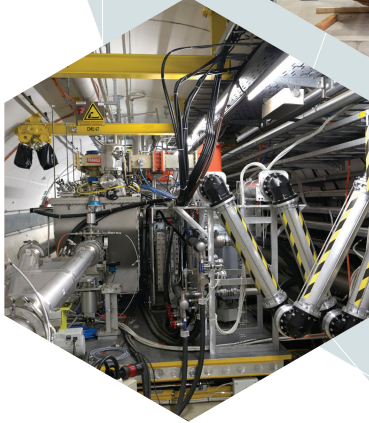
(OPEN-PHO-EXHI-2018-003-22)



1 JUNE

The FRESCA2 magnet, which will serve as a test station for future superconductors, establishes a new intensity record, producing a magnetic field of 14.6 teslas.

(CERN-PHOTO-201603-062-2)



29 MAY

Crab cavities tilt proton beams for the first time, validating these key components designed for the High-Luminosity LHC.

(CERN-PHOTO-201803-055-2)

15 JUNE

A ceremony marks the start of work for the High-Luminosity LHC.
(CERN-PHOTO-201806-146-4)



1 JULY

The teacher-training programme celebrates its 20th anniversary.
(OPEN-PHO-LIFE-2018-007-2)



20 JULY

ELENA, the new antimatter decelerator, sends protons to an experiment, GBAR, for the first time. This experiment studies the effect of gravity on antimatter.
(CERN-PHOTO-201804-086-10)



20 & 21 JUNE

Borut Pahor, President of Slovenia, and Alain Berset, President of the Swiss Confederation, visit CERN.
(CERN-PHOTO-201806-156-21)
(CERN-PHOTO-201806-158-1)

1 AUGUST

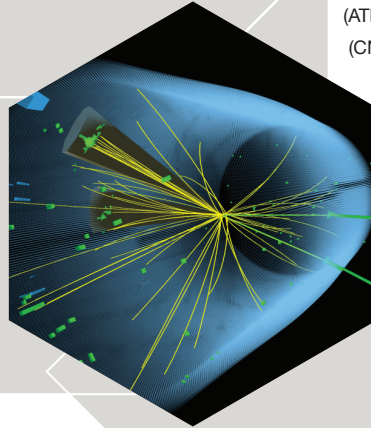
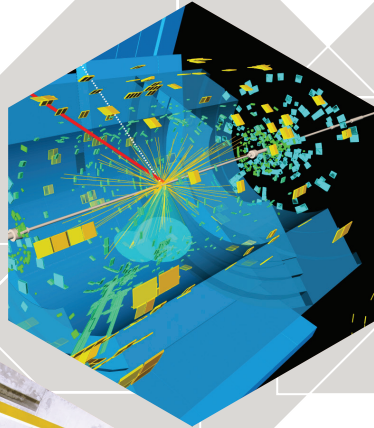
CERN is the guest of honour at the Swiss National Day celebrations in Geneva.
(CERN-PHOTO-201808-185-7)

28 AUGUST

The decay of the Higgs boson into bottom quarks is finally observed.

(ATLAS-PHOTO-2018-022-1)

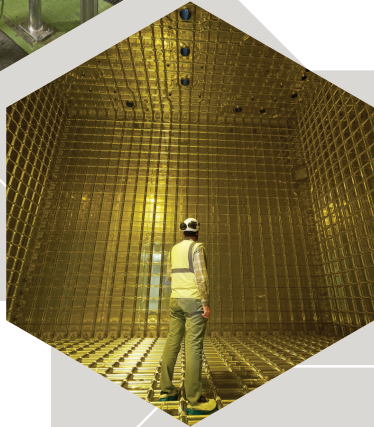
(CMS-PHO-EVENTS-2018-008-1)



29 AUGUST

The AWAKE collaboration announces the first ever acceleration of electrons using a wakefield created by protons circulating in a plasma.

(CERN-PHOTO-201711-284-5)



18 SEPTEMBER

The prototype of the huge DUNE neutrino detector records its first particle tracks.

(CERN-PHOTO-201710-248-2)



27 SEPTEMBER

The LHCb collaboration discovers two new baryons and finds hints of the existence of a new particle made up of four quarks.

(CERN-PHOTO-201801-025-18)

28 SEPTEMBER

CERN, the state of Geneva and the commune of Meyrin inaugurate the Esplanade des Particules, which marks the entrance to the Laboratory and becomes its new official address.

The same evening, CERN welcomes the public for Researchers' Night.

(CERN-PHOTO-201809-249-55)



8 OCTOBER

The winners of the 2018 Beamline for Schools competition come to CERN to perform their physics experiments. The two teams of secondary-school pupils are from India and the Philippines.

(CERN-PHOTO-201809-239-22)



28 SEPTEMBER

The CERN Council elects Ursula Bassler as its president; she will take on the role in 2019.

(CERN-PHOTO-201809-247-1)

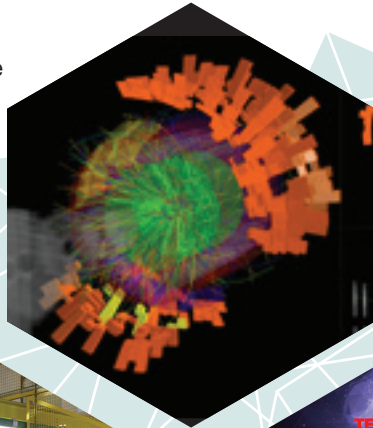
16 OCTOBER

The CERN Council launches the process of updating the European Strategy for Particle Physics, which will set the course for the discipline in the coming years.

13 NOVEMBER

The first collisions of lead nuclei mark the start of a new heavy-ion run at the LHC.

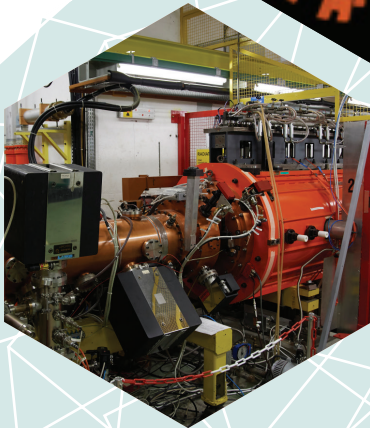
(ALICE-EVENTDISPLAY-2018-003-1)



24 OCTOBER

The final protons of 2018 circulate in the LHC, marking the end of the accelerator's second run. Two weeks later, Linac2, a linear accelerator that came into operation in 1972, is definitively shut down.

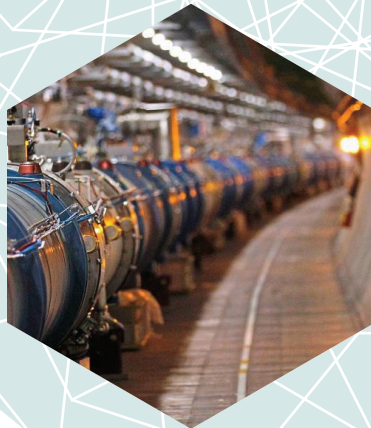
(CERN-PHOTO-201811-295-2)



20 NOVEMBER

Digital and life-science experts attend the fifth TEDxCERN event to discuss scientific innovations with the potential to transform our world.

(CERN-PHOTO-201811-305-3)



3 DECEMBER

The accelerator complex and experiments are shut down for two years, during which major upgrade work will take place.

(CERN-PHOTO-201812-327-3)

19 DECEMBER

The first result from the HIE-ISOLDE accelerator confirms that the tin-132 nucleus belongs to the group of doubly magic nuclei.

(OPEN-PHO-ACCEL-2016-016-2)