



**GOETHE  
INSTITUT**



## INTERNATIONAL SHORTLIST 2015

### EARLY LEARNERS (5 – 8 years) (4 films)

<b>Title:</b>	House of Little Scientists: Mirror (Short)
<b>Original Title:</b>	บ้านนักวิทยาศาสตร์น้อย
<b>Format:</b>	Edutainment
<b>Category:</b>	Family Edutainment
<b>Director:</b>	Warinnet Termsirikamol
<b>Produced by:</b>	Princess Maha Chakri Sirindhorn Foundation
<b>Running Time:</b>	3 Minutes
<b>Country:</b>	Thailand
<b>Year:</b>	2014
<b>Age Guideline:</b>	Early Learners (5-8)

*House of Little Scientists* is a science education series for early school children, which emphasizes learning through wonder, observation and experiments. Children will experience new things about the science that surrounds them through fun activities.

<b>Title:</b>	House of Little Scientists: Bubbles (Complete Episode)
<b>Original Title:</b>	บ้านนักวิทยาศาสตร์น้อย
<b>Format:</b>	Edutainment
<b>Category:</b>	Family Edutainment
<b>Director:</b>	Warinnet Termsirikamol
<b>Produced by:</b>	Princess Maha Chakri Sirindhorn Foundation
<b>Running Time:</b>	10 Minutes
<b>Country:</b>	Thailand
<b>Year:</b>	2014
<b>Age Guideline:</b>	Early Learners (5-8)

House of Little Scientists series is the science educational program for pre-school children which emphasizes learning by wondering, observation and experiments. The children will experience new things about science surround them with fun.

The audiences will enjoy and learn at the same time with children in the stories who simply explore and experience science around them. Also they will laugh and be funny with 4 cartoon characters (Kan, Keaw, the cat and the dragon) in the fantasy funny stories concerning the science topics in each episode.

<b>Title:</b>	Chirp – 105 – Astro-Birds
<b>Format:</b>	Edutainment

**Category:** Family Edutainment  
**Director:** Mike Valiquette & Voice Director – J.J. Johnson  
**Produced by:** Sinking Ship Entertainment Executive Producers – J.J. Johnson, Blair Powers, Pete Denomme Producer – Jain Dickson Creative Producer – Sheila Dinsmore Associate Producer – Martha Sepuleveda Voice Director – J.J. Johnson Smiley Guy Studios Executive Producer – Jonas Diamon Producer/Director – Mike Valiquette Line Producer – Julie Otten  
**Running Time:** 11 Minutes  
**Country:** Canada  
**Year:** 2014  
**Age Guideline:** Early Learners (5-8)

Chirp, Tweet and Squawk are three friends who use their imaginations and everyday objects to get them in – and out of – fantastically fun adventures and hilariously sticky predicaments! What would it be like to be a pirate or travel in space, dive underwater on an electric eel or train a dinosaur? Just ask Chirp and his friends – they play it everyday. In each 11 minute episode, best friends Chirp, Tweet and Squawk imagine themselves into fantastical adventures. They go on grand quests through jungles and on spy missions, but ultimately their imaginations get them into some trouble. That’s where the Mail Squirrel comes in handy. Everyday, at just the right time, the Mail Squirrel drops off a package for Chirp from his Grandma. Seemingly innocuous items like a fan, elastic band or popsicle stick become a play-saver when Chirp and his friends are able to engineer them into something more helpful.

In this episode, Captain Chirp, Captain Tweet and Captain Squawk of the spaceship Yellow Bird find themselves caught in an asteroid field. When an asteroid tears open their ship, the birds use modeling clay to patch the hole and then use it again to rescue Squawk.

**Title:** Now You Know – 125 – How Does A Rainbow Happen  
**Format:** Edutainment  
**Category:** Family Edutainment  
**Director:** Ben Mazzotta  
**Produced by:** Producers – Ben Mazzotta, Maria Kennedy Executive Producers – Matthew J.R. Bishop, J.J. Johnson, Maria Kennedy, Ben Mazzotta, Blair Powers  
**Running Time:** 7 Minutes  
**Country:** Canada  
**Year:** 2014  
**Age Guideline:** Early Learners (5-8)

Howie, a curious 5-year old boy, and his best friend, little monkey Baboo, ask ALOT of questions. In each episode their bedroom, kitchen, or backyard transforms into a magical animated world where they race sports-cars, become butterflies, swim under the sea, slide down a rainbow, or blast off into Space. Their play inspires real-world questions: How do fish breathe underwater?, What’s a rainbow?, How does an astronaut float in Space?, or Where does the water go when you flush the toilet?

At their treehouse, real-life kids aka “Questioners” pop up on Howie’s computer to offer responses. A real-life Expert invites Howie and Baboo to visit his or her facility to explore the question together. They learn about what happened to the dinosaurs at a museum, how birds fly at an animal conservation centre, what moon craters are at one of Canada’s largest telescopes, even how water in a waterfall keeps flowing at Niagara Falls! Animated infographics illustrate and a song-and-dance recaps at the end of every episode. Through the process of play-based learning, Howie, Baboo and their preschool audience explore, experiment, and laugh their way through each adventure as they learn about science and the world around them.

Howie slides down the other side of a rainbow to find a pot of gold, and Baboo the leprechaun grants him three wishes. In their bedroom, they wonder, “How does a rainbow happen?” They visit climatologist David Phillips at Environment Canada, who shows them how to make the colours of the rainbow with a prism, and how raindrops interact with sunlight to become little prisms that make a rainbow.

## PRIMARY SCHOOL (9 -11 years) (11 films)

<p><b>Title:</b> nine-and-a-half: Bright Night – How Light Pollutes the Environment  <b>Original Title:</b> neuneinhalb: Helle Nacht – Wie Licht die Umwelt verschmutzt  <b>Format:</b> Standalone Documentary  <b>Category:</b> Family Edutainment [Festival Theme 2015: Light]  <b>Director:</b> Stefan Brand  <b>Produced by:</b> tvision gmbh im Auftrag des WDR  <b>Running Time:</b> 10 Minutes  <b>Country:</b> Germany  <b>Year:</b> 2014  <b>Age Guideline:</b> Primary School (9 – 11)</p> <p>Thousands of street lights, colorful neon signs and bright spotlights turn night into day in major cities. Rarely is it really dark. It may look great, but is becoming a problem, because the artificial light is polluting the environment. How exactly does this happen and what consequences can this have?</p> <p>Johannes wants to find out and meets with lighting expert Dr. Hölker. Using an experiment, he attempts to show Johannes the effects overexposure to light can have on animals. What happens in the experiment? What special role is played by the moon? And what can you do to protect the environment from the increasing light pollution? That and more is revealed in this episode of <i>nine-and-a-half</i>.</p>
<p><b>Title:</b> The Light Elephant  <b>Original Title:</b> Der Lichtelefant (Sachgeschichte aus der Sendung mit dem Elefanten)  <b>Format:</b> Animation or Shortfilm  <b>Category:</b> Family Edutainment [Festival Theme 2015: Light]  <b>Director:</b> Birgit Quastenberg  <b>Produced by:</b> Westdeutscher Rundfunk  <b>Running Time:</b> 10 Minutes  <b>Country:</b> Germany  <b>Year:</b> 2015  <b>Age Guideline:</b> Primary School (9 – 11)</p> <p>André has a very special present for the little blue Elephant. With the help of a pocket lamp and many single pictures he can “paint” an elephant with light. Light painting, or light drawing, is a photographic technique in which exposures are made by moving a hand-held light source while taking a long exposure photograph, either to illuminate a subject or to shine a point of light directly at the camera.</p>
<p><b>Title:</b> The Show with the Mouse: Glass Engraving  <b>Original Title:</b> Glasinnengravur (Sachgeschichte aus der Sendung mit der Maus)  <b>Format:</b> Animation or Shortfilm  <b>Category:</b> Family Edutainment [Festival Theme 2015: Light]  <b>Director:</b> Katja Engelhardt  <b>Produced by:</b> Westdeutscher Rundfunk  <b>Running Time:</b> 8 Minutes  <b>Country:</b> Germany  <b>Year:</b> 2015  <b>Age Guideline:</b> Primary School (9 – 11)</p> <p>How does the Cologne Cathedral come into a block of glass? And what about a cat? Johannes is impressed by the small works of art made out of glass that you can buy as souvenirs. He has an idea: How about setting the mouse in such a beautiful block of glass? But how does this work? Johannes finds the answer in Dresden, where he visits Mr. Glück. He works in a "glass engraving company" and shows Johannes step by step how the mouse appears in the glass through a special laser technology.</p>
<p><b>Title:</b> Discover Science: A Sky Full of Rainbows  <b>Format:</b> Edutainment  <b>Category:</b> Family Edutainment {Festival Theme 2015: Light}</p>

**Director:** Akiyuki Terashima  
**Produced by:** Produced by NHK Co-Produced by NHK/PTS/SABC/UR  
**Running Time:** 14 Minutes  
**Country:** Japan  
**Year:** 2014  
**Age Guideline:** Primary School (9 – 11)

Can we fill the sky with rainbows? Our experimenters take on the challenge of creating lots of differently sized rainbows using sprays of water and saltwater. We learn that water and saltwater refract light to different degrees and that the degree of refraction in saltwater depends on the salt concentration. This episode is a coproduction with the Taiwan Public Television Service. The experiment needed a massive amount of saltwater, so it was shot in a disused saltpan in Taiwan.

**Title:** Hawkeye: Science of Light  
**Original Title:** Matanglawin: Science of Light  
**Format:** Edutainment  
**Category:** Family Edutainment [Festival Theme 2015: Light]  
**Director:** N/A  
**Produced by:** ABS-CBN Corporation  
**Running Time:** 28 Minutes  
**Country:** Philippines  
**Year:** 2014  
**Age Guideline:** Primary School (9 – 11)

Make no mistake about it, for this Matanglawin episode, join Kuya Kim in saying: “let there be light!” Let your “light” know-how shine because Kuya Kim will be revealing amazing facts about reflection and refraction and how light makes the world go round! And if you think that’s already amazing, wait until Matanglawin shows you how to make batteries to make little LED lights work using a root crop and a fruit! But which will really work: a potato or a lemon?

Kuya Kim will also show you how to make an ordinary school item glow right in front of your eyes. Where there’s light, there’s also the dark...but in this case, there’s glow-in-the-dark! Discover the secret behind “glowing water” that will surely make any party much cooler and be amazed at what makes neon lights different from your ordinary light bulb. There’s also laser light which can be used both for games and medicine...and also for dancing!

**Title:** I Got It! – Climate Change  
**Format:** Edutainment  
**Category:** Family Edutainment  
**Director:** Grace Torres  
**Produced by:** UBE Media, Inc. and Goethe Institut  
**Running Time:** 10 Minutes  
**Country:** Philippines  
**Year:** 2014  
**Age Guideline:** Primary School (9 – 11)

This episode tries to make other children understand more about climate change through the story of typhoon Yolanda (Haiyan) victims-Dimple and Hadassa. The two girls share their experiences and observations during the typhoon and how they cope with the situation. The episode also explains how global warming and climate change can result to catastrophic effects and present ways on how we can help in reducing greenhouse gas emissions.

**Title:** I Got It! – Time  
**Format:** Edutainment  
**Category:** Family Edutainment  
**Director:** Grace Torres  
**Produced by:** ABS-CBN Foundation, Inc. and Goethe Institut  
**Running Time:** 10 Minutes

**Country:** Philippines  
**Year:** 2012  
**Age Guideline:** Primary School (9 – 11)

Cinderella and Dracula are having problems telling the correct time because their watches are broken. They went to Archie who tries to fix it. The presenter Archie explains the history of the calendar, the evolution of time measurement devices and the importance of time itself.

**Title:** Annedroids – 107 – Junkyard Sleepover  
**Format:** Edutainment  
**Category:** Family Edutainment  
**Director:** J.J. Johnson  
**Produced by:** Executive Producer(s) – Blair Powers, J.J. Johnson Co- Executive Producer – Christin Simms Producer – Matthew J.R. Bishop Animation Producer – Matt Bishop  
**Running Time:** 22 Minutes  
**Country:** Canada  
**Year:** 2013  
**Age Guideline:** Primary School (9 – 11)

Eleven-year old genius and kid-scientist Anne has invented and built her own amazing androids. Nick discovers Anne's secret junkyard laboratory and enlists the help of Shania to befriend Anne and her mechanical companions. Together they help solve Anne's scientific problems through real-life solutions.

Anne has built a brand new observatory and invites Nick and Shania to a sleepover so they can witness the lunar eclipse. First, Nick needs to get permission from his Mom to spend the night at the junkyard. The kids decide that it's time for Nick's Mom to meet Anne's Dad.

**Title:** Annedroids – 108 – Pal In the Middle  
**Format:** Edutainment  
**Category:** Family Edutainment  
**Director:** Kelly Harms  
**Produced by:** Executive Producer(s) – Blair Powers, J.J. Johnson Co- Executive Producer – Christin Simms Producer – Matthew J.R. Bishop Animation Producer – Matt Bishop  
**Running Time:** 22 Minutes  
**Country:** Canada  
**Year:** 2013  
**Age Guideline:** Primary School (9 – 11)

Eleven-year old genius and kid-scientist Anne has invented and built her own amazing androids. Nick discovers Anne's secret junkyard laboratory and enlists the help of Shania to befriend Anne and her mechanical companions. Together they help solve Anne's scientific problems through real-life solutions.

Shania is stuck at home taking care of her little brother Garth while Anne and Nick build a rainbow maker with a prism. Unfortunately, while Anne and Nick are busy, the prism accidentally sails over the junkyard fence when Hand and Eyes are playing monkey in the middle with Pal.

**Title:** Cracker Snap!  
**Original Title:** Knall Genial  
**Format:** Edutainment  
**Category:** Family Edutainment  
**Director:** Bernhard Nezdol  
**Produced by:** Tower10 KidsTV  
**Running Time:** 15 Minutes  
**Country:** Austria  
**Year:** 2014  
**Age Guideline:** Primary School (9 – 11)

Funny, crazy and just "cracker snap": The new "okidoki" Knowledge format by and with Thomas Brezina. Each episode consists of fun short films, all of which combine to a certain "wow" effect. Why did pirates wear eye patches? Can horses sleep standing up? And how do you bake a checkered cake?

In this episode, the children experience a very special fish feeding first-hand. Thomas shows kids how to make a wooden spatula jump. Noah is trying to figure out how to make an entire roll of toilet paper disappear as quickly as possible. Anouk is preparing a colorful salad that is a hit at any party. An exciting musical pirate adventure is waiting for Stani behind the magic door and at the end of the show, Thomas reveals an amazing trick with a calculator.

<b>Title:</b>	Earth To Future – Bionics
<b>Original Title:</b>	Erde An Zukunft – Bionik: Die Natur als Vorbild
<b>Format:</b>	Science Magazine
<b>Category:</b>	Familij Edutainment
<b>Director:</b>	Tom Miles (Creative Producer)
<b>Produced by:</b>	KiKA – Der Kinderkanal von ARD und ZDF (Commissioned Production)
<b>Running Time:</b>	10 Minutes
<b>Country:</b>	Germany
<b>Year:</b>	2015
<b>Age Guideline:</b>	Primary School (9 – 11)

Nature is the inspiration for bionics. Even over 500 years ago, Leonardo da Vinci transferred the principle of bird flight to his flying machines. So bionics combines biology and technology to create new inventions that make our lives easier. For nature often provides incredibly clever solutions: the sandpipers running quickly over the surface of the water, birds glide effortlessly through the air, fish appear to move without resistance through the water. The pioneering trends of bionics research – in Earth to Future!

## SECONDARY SCHOOL (12 – 16 years) (19 films)

<b>Title:</b>	Fascinating Universe – Are we alone?
<b>Original Title:</b>	Faszination Universum – Sind wir allein?
<b>Format:</b>	Science Magazine
<b>Category:</b>	Natural Science, Life Science & Technology
<b>Director:</b>	Carsten Gutschmidt
<b>Produced by:</b>	ZDF
<b>Running Time:</b>	43 Minutes
<b>Country:</b>	Germany
<b>Year:</b>	2014
<b>Age Guideline:</b>	Secondary School (12 – 16)

Are we alone in space? And if not – where are they, then? Once upon a time it was at best a subject for science-fiction writers. For about 20 years, however, serious scientists have also been searching for islands of life around other stars. It is obvious what they are looking for: a little blue planet where there is water and life. And while searching for a blue diamond like that in the vast abysses of the Milky Way, the scientists have discovered a number of big surprises directly before our own door. Who would have guessed that there would probably be no life on Earth today without the moon?

Science-fiction frequently features visitors from outer space – in fact today many scientists are convinced that our early solar system had a very decisive visit, though it looked different from what one might think. Most people imagine that our sun is a common bread in the universe. In fact it is a rare species, the majority of stars are much smaller with a reddish glow. Life with such a sun would have to find special ways to blossom.

**Title:** Header – Pinhole Camera  
**Original Title:** Kopfball – Lochkamera  
**Format:** Science Magazine  
**Category:** Natural Science, Life Science & Technology  
 [Festival Theme 2015: Light]  
**Director:** Krischan Dietmaier  
**Produced by:** Bilderfest GmbH im Auftrag des WDR  
**Running Time:** 10 Minutes  
**Country:** Germany  
**Year:** 2014  
**Age Guideline:** Secondary School (12 – 16)

If you close the blinds on a window to a small slit, "colorful shadows" appear in the room on the walls and ceiling. *Header* reporter Adrian learns that these colorful shades are far more than is assumed at first glance when he meets the Swiss photographer Philipp Werner. Together, they explore the origin of the mysterious shadows and finally convert an entire room using a tarp and a piece of cardboard into a giant pinhole camera. Adrian is not only excited about the fascinating images that his room camera makes, but also learns how US researchers use the special technique of the effect to capture blackmailers.

**Title:** The Mecca Clock Tower – Lighting System  
**Original Title:** Die Turmuhr zu Mekka – Lichtkonzept  
**Format:** Standalone Documentary  
**Category:** Natural Science, Life Science & Technology  
 [Festival Theme 2015: Light]  
**Director:** Thomas Lau  
**Produced by:** Achmed Rasch  
**Running Time:** 15 Minutes  
**Country:** Germany  
**Year:** 2013/2014  
**Age Guideline:** Secondary School (12 – 16)

It is a construction project full of superlatives: the world's largest tower clock in Mecca, the Holy City of Islam. The building at the center of the sacred site breaks over 30 world records. It is an engineering masterpiece, 35 times larger than Big Ben. Engineers from SL Rasch in Stuttgart, Germany developed and constructed the clock. A special challenge was the lighting system. The German engineers developed with Christian Bartenbach from the Scientific Light Institute in Innsbruck the largest light concept of the world. By night over two million LEDs illuminate the tower clock making it legible from distances of over eight kilometers.

**Title:** The Power of Light and Sound  
**Original Title:** Die Kraft von Licht und Ton oder Die unglaubliche Reise an die Grenzen deines Fernsehers  
**Format:** Science Magazine  
**Category:** Natural Science, Life Science & Technology  
 [Festival Theme 2015: Light]  
**Director:** Harald Marburger  
**Produced by:** ProSiebenSat1 TV Deutschland  
**Running Time:** 13 Minutes  
**Country:** Germany  
**Year:** 2015  
**Age Guideline:** Secondary School (12 – 16)

You think you know your TV? This film reveals your favorite dinner companion and boredom fighter into something completely different. Namely a transmitter of emotions! Using certain light and sound combinations, the television can even transmit mood. How does that work? Find out in this film, which explains the origin of emotions relating to light and sound.

**Title:** The Secret of Neon Advertising Signs  
**Original Title:** Das Geheimnis der Neon-Reklame  
**Format:** Edutainment  
**Category:** Natural Science, Life Science & Technology  
 [Festival Theme 2015: Light]  
**Director:** Leele Gilles / Stefan Otto  
**Produced by:** gutentagproduktion (im Auftrag von ProSieben)  
**Running Time:** 10 Minutes  
**Country:** Germany  
**Year:** 2014  
**Age Guideline:** Secondary School (12 – 16)

Fluorescent lighting is currently experiencing a worldwide increase in popularity. Artists, club owners and cafe owners use the luminous tubes for their projects. Why? We visit the last and only neon glass blower in Hamburg, Germany, and make the amazing discovery that neon advertising signs do not come from a big factory, but that each lamp is unique and handmade.

**Title:** X:enius – Cuttlefish  
**Original Title:** X:enius – Kalmare  
**Format:** Science Magazine  
**Category:** Natural Science, Life Science & Technology  
 [Festival Theme 2015: Light]  
**Director:** Angela Volkner  
**Produced by:** Sven Gummich  
**Running Time:** 26 Minutes  
**Country:** Germany  
**Year:** 2014  
**Age Guideline:** Secondary School (12 – 16)

In the stories of sailors, octopus and squid play the role of the sea monster. For science, the intelligent and trainable "cuttlefish" is a highly interesting subject of study. The Max Planck Institute for Brain Research in Frankfurt for example examines the communication between cuttlefish. They use complex, moving color patterns on their skin to exchange ideas. Some species have even developed a kind of quadrupeds stride on the seabed. For this, the animals need enormous brain power, which still has the scientists still puzzled. The *X:enius* presenters Adrian and Emilie visit the Oceanographic Museum in Monaco in this episode and test the intelligence of an octopus using a startling experiment.

**Title:** X:enius: LED Light Emitting Diode – The Light of the Future?  
**Original Title:** X:enius LED – das Licht der Zukunft?  
**Format:** Science Magazine  
**Category:** Natural Science, Life Science & Technology  
 [Festival Theme 2015: Light]  
**Director:** Fabian Wolf  
**Produced by:** Bilderfest GmbH im Auftrag des WDR  
**Running Time:** 26 Minutes  
**Country:** Germany  
**Year:** 2014  
**Age Guideline:** Secondary School (12 – 16)

The LED – light-emitting Diode – has reached our everyday life. It promises low power consumption, pleasant light and long life. How does this modern technology work? And how is LED different from other light sources? This episode of *X:enius* wants to find out exactly that and visits different pilot projects throughout Germany, such as the Berlin Charité. Researchers at the Fraunhofer Institute in Potsdam have



already gone a step further: they are dealing with the O-LED, an ultra-thin light – with no limits on the imagination what this light can do.

**Title:** X:enius: Lenses – Better Than the Human Eye?  
**Original Title:** X:enius: Objektive – Besser als das menschliche Auge?  
**Format:** Science Magazine  
**Category:** Natural Science, Life Science & Technology  
[Festival Theme 2015: Light]  
**Director:** Fabian Wolf  
**Produced by:** Bilderfest GmbH im Auftrag des WDR  
**Running Time:** 26 Minutes  
**Country:** Germany  
**Year:** 2015  
**Age Guideline:** Secondary School (12 – 16)

Lenses determine how we perceive our world. Without such optical aid, no imaging technique of modernity would exist. However, in fact it hides a complex technique: an expensive high-tech lens today consists of up to 800 items. Are lenses ultimately even better than the human eye? The simplest camera in the world comes without a lens. A simple hole and lots of light are enough to make pictures of reality on the principle of the so-called "pinhole camera". Two Parisian cousins drive the process with the help of modern cameras to perfection. In scientific research, new optical methods are triggering a revolution in how we perceive the world through our artificial eyes.

**Title:** Brussels – City of Light  
**Format:** Science Magazine  
**Category:** Natural Science, Life Science & Technology  
[Festival Theme 2015: Light]  
**Director:** Patrice Goldberg / Véronique Neczyporenko  
**Produced by:** Matière Grise  
**Running Time:** 26 Minutes  
**Country:** Belgium  
**Year:** 2013  
**Age Guideline:** Secondary School (12 – 16)

Belgian researchers, both in the academic and private sector, can boast bright ideas... and for good reasons since they are world leaders in the field of photonics: the science of light! A science that will quickly revolutionize the industry... and our consumption patterns. Just take a look at the extraordinary work in Belgian laboratories!

**Title:** Greatest Danish Scientists – Niels Bohr  
**Format:** Documentary Series  
**Category:** Natural Science, Life Science & Technology  
[Festival Theme 2015: Light]  
**Director:** Martin Sundstrøm  
**Produced by:** DR - National Danish Broadcast  
**Running Time:** 29 Minutes  
**Country:** Denmark  
**Year:** 2015  
**Age Guideline:** Secondary School (12 – 16)

A film about the perhaps greatest Danish Scientist ever: Niels Bohr. It portrays his life and important discoveries from the atom model which explained how light is created, and the theoretical basis for the nuclear bomb. The novel idea is that the host Johan Olsen is able to travel in time to meet Niels Bohr, and ask him modern questions. An actor plays Niels Bohr and all dialogue is based on interviews, books or papers by Niels Bohr.

**Title:** How We Got to Now: Light  
**Format:** Standalone Documentary

**Category:** Natural Science, Life Science & Technology  
[Festival Theme 2015: Light]  
**Director:** Paul Olding  
**Produced by:** Paul Olding  
**Running Time:** 54 Minutes  
**Country:** United Kingdom  
**Year:** 2014  
**Age Guideline:** Secondary School (12 – 16)

Best-selling author Steven Johnson tells the story of the people who took us out of the dark and into the light, including the invention of Edison's light bulb and how an 18th-century shipping community discovered a source of illumination by putting a kid inside a whale's head. From candlelight to high precision lasers, this illuminating account of the transformative power of light is one of brilliant minds, high drama and ingenuity.

**Title:** Northern Lights: A Magic Experience  
**Format:** Standalone Documentary  
**Category:** Natural Science, Life Science & Technology  
[Festival Theme 2015: Light]  
**Director:** Pål Brekke  
**Produced by:** Pål Brekke and Fredrik Broms  
**Running Time:** 27 Minutes  
**Country:** Norway  
**Year:** 2014  
**Age Guideline:** Secondary School (12 – 16)

The 25 minute documentary takes you on a breathtaking journey through space. By using pedagogic top-quality animations and spectacular solar imagery from NASA satellites it tells the full story of the northern lights from myth to science. The film is packed with interesting historical anecdotes and includes the story about Kristian Birkelands amazing discovery and Terrella experiment.

It also includes tips about how to take your own stunning aurora photos. It includes some of the world's best photography and time lapse sequences of the northern lights. The film is perfectly suited for use at science museums, planetariums, hotels and by aurora tour guide companies. The documentary is produced by Pål Brekke, an international recognized solar physicist and public outreach expert with many years at NASA Goddard Space Flight Center

**Title:** Revolutionary Biology: The History of Structural Biology  
**Format:** Documentary Series  
**Category:** Natural Science, Life Science & Technology  
[Festival Theme 2015: Light]  
**Director:** Daniel Roberts  
**Produced by:** Jonathan Brodie, Hannah Madsen  
**Running Time:** 6 Minutes  
**Country:** United Kingdom  
**Year:** 2014  
**Age Guideline:** Secondary School (12 – 16)

Light has been used to revolutionize modern medicine over the past century, but it's about time people knew about it. 2014 marks the centenary of the discovery of X-ray crystallography, which is one of the most successful and widely used techniques for finding the 3D structure of a protein. This documentary, part of a four-part series, explains how the field of structural biology has developed over the past 100 years.

**Title:** Solar Impulse: Across America  
**Format:** Documentary Series  
**Category:** Natural Science, Life Science & Technology  
**Director:** Eric Beaufils  
**Produced by:** Stéphane Milliere  
**Running Time:** 52 Minutes

**Country:** France  
**Year:** 2015  
**Age Guideline:** Secondary School (12 – 16)

Solar Impulse is the only airplane of perpetual endurance, able to fly day and night on solar power, without a drop of fuel. After completing several missions in Europe and Morocco, and before its attempt of the First Round-The-World Solar Flight in 2015, Solar Impulse has completed the historic crossing of the United States, west to east, over a 2-month period in the summer of 2013. In the footsteps of aviation pioneers like the Wright brothers and Charles Lindbergh, Bertrand Piccard and André Borschberg underwent the coast-to-coast challenge, namely 5600 km, to spread a message.

By flying from San Francisco to New York powered solely by the sun, the two pilots could demonstrate how pioneering spirit, innovation and clean technologies can change the world. This documentary-film is the story of their incredible American epic.

**Title:** A Light Lesson  
**Format:** Animation or Shortfilm  
**Category:** Natural Science, Life Science & Technology  
[Festival Theme 2015: Light]  
**Director:** Candice Lim Wan Chi & Allan Ng Wee Ren  
**Produced by:** Andrew Morgan Tennant, Allan Ng Wee Ren, Candice Lim Wan Chi  
**Running Time:** 3 Minutes  
**Country:** Malaysia  
**Year:** 2015  
**Age Guideline:** Secondary School (12 – 16)

Light is an essential element in our daily lives. This video provides an overview of vital life processes and applications enabled by light. Professor Light begins with an introduction to two general examples, namely vision and heat. He continues to talk about the day-and-night cycle, photosynthesis and plant development, as well as the visible spectrum. Professor Light proceeds to introduce several light-operated laboratory equipment, namely microplate reader, light microscope, spectrophotometer, and gel viewer. The short film concludes with an emphasis to switch off lights to preserve the environment.

**Title:** The Physics of Light  
**Format:** Documentary Series  
**Category:** Natural Science, Life Science & Technology  
[Festival Theme 2015: Light]  
**Director:** Si Joon Kim, Hyung Joon Kim  
**Produced by:** Korea Educational Broadcasting System  
**Running Time:** 52 Minutes  
**Country:** South Korea  
**Year:** 2014  
**Age Guideline:** Secondary School (12 – 16)

Throughout ancient history, light was worshipped as the holy giver of all life. Yet, many an inquisitive mind sought to bring light down from its sacred pedestal and reveal its true nature through science. In this 6-part documentary, we will embark on a scientific odyssey in pursuit of light. We will tell the story of those brilliant scientists who little by little unveiled the amazing secrets of light, and through their story, and through easy-to-understand examples, we will attempt to understand the incredible theories about light which have brought us closer to answering the most basic questions about how the universe works.

**Title:** Look into My World – Lennart Speaks Through His Eyes  
**Original Title:** Schau in meine Welt! – Lennart spricht mit den Augen  
**Format:** Standalone Documentary  
**Theme:** Natural Science, Life Science & Technology  
**Director:** Klaus Tümmeler  
**Produced by:** Condor Filmproduktion Berlin  
**Running Time:** 25 Minutes

**Country:** Germany  
**Year:** 2014  
**Age Guideline:** Secondary School (12 – 16)

Lennart is 11 years old and lives in Hannover, Germany. Lennart cannot speak. His vocal cords do not work and Lennart can not really move his arms and legs. The reason is a spastic paralysis, which he has had since birth. Lennart literally speaks through his eyes: he communicates through a speech computer – a so-called "talker". Lennart controls the device only with his eyes. Built-in infrared cameras constantly register the movements of his eyes.

Lennart attends a normal school and has quite a few friends. During school hours Lennart is supported by Lisa. The two often understand each other without words and make a winning team. For Lennart's schoolmates, his disability is not a big issue. They like him as he is, appreciate his sense of humor and that he is so smart. Lennart's biggest dream: with the help of medical progress to be able to talk and run on his own in the future.

**Title:** Nerd: Space Edition  
**Format:** Edutainment  
**Category:** Natural Science, Life Science & Technology  
**Director:** Andreas Bo Jensen  
**Produced by:** Danish Broadcasting Corporation  
**Running Time:** 23 Minutes  
**Country:** Denmark  
**Year:** 2014  
**Age Guideline:** Secondary School (12 – 16)

*Nerd* is about to fly into space. One of the two brothers, Emil and Kaare, are about to experience parabolic flight and microgravity with the European Space Agency. The best fitted of them will get the adventure!

**Title:** Beekeeping in Oman  
**Format:** Science Magazine  
**Category:** Natural Science, Life Science & Technology  
**Director:** Kathrin Seward  
**Produced by:** Boekamp & Kriegsheim GmbH  
**Running Time:** 10 Minutes  
**Country:** Germany / Oman  
**Year:** 2014  
**Age Guideline:** Secondary School (12 – 16)

In the region of Rustaq in Northern Oman, beekeeping is a very old tradition. The film follows two bee researchers on their field trip to a remote village up in the mountains. Here, they meet the local beekeepers and give an insight in the balancing act between the modern and the traditional Omani way of beekeeping.

## YOUNG ADULTS (17+) (8 films)

<p><b>Title:</b> Big Earth Data  <b>Original Title:</b> Big Earth Data – Die digitalisierte Erde  <b>Format:</b> Standalone Documentary  <b>Category:</b> Natural Science, Life Science &amp; Technology  <b>Director:</b> Tamar Baumgarten  <b>Produced by:</b> Stefan Schneider Gruppe5  <b>Running Time:</b> 53 Minutes  <b>Country:</b> Germany  <b>Year:</b> 2014  <b>Age Guideline:</b> Young Adults (17+)</p> <p>What a survey of the world reveals. A host of satellite sensors and cameras are meanwhile observing our blue planet with eagle eyes. Earth observation systems in space gather enormous amounts of data about storms, floods, drought, or melting ice every day. They measure the Earth's surface to the smallest detail or visualize its gravitational field. But what can be learnt from it?</p>
<p><b>Title:</b> Building for the Future - How Climate Change is Impacting Architecture  <b>Original Title:</b> Wetter und Architektur – Bauen für die Zukunft  <b>Format:</b> Science Magazine  <b>Category:</b> Ecology &amp; Environment  <b>Director:</b> Ariane Riecker  <b>Produced by:</b> Hoferichter &amp; Jacobs  <b>Running Time:</b> 52 Minutes  <b>Country:</b> Germany  <b>Year:</b> 2013/2014  <b>Age Guideline:</b> Young Adults (17+)</p> <p>Extreme weather and climate change pose new challenges for architects and civil engineers. How can we protect ourselves from storms, rising sea levels or huge amounts of precipitation? The film follows three visionary architects who face this challenge: an American whose homes can be sunk into the ground, a Dutchman, whose housing estates float and a German, who builds with the latest technologies to combat climate change.</p>
<p><b>Title:</b> Mobile Phone – Radiation Risk?  <b>Original Title:</b> Handy – Strahlendes Risiko?  <b>Format:</b> Standalone Documentary</p>

**Category:** Natural Science, Life Science & Technology  
**Director:** Nanje de Jong-Teuscher; Claus U. Eckert  
**Produced by:** Kay Siering, Spiegel TV  
**Running Time:** 52 Minutes  
**Country:** Germany  
**Year:** 2015  
**Age Guideline:** Young Adults (17+)

Almost seven billion mobile phones are used worldwide. Yet could the radiation of the devices may be much more dangerous than we presently know? German, French and Swedish researchers come to different, sometimes conflicting results. The film follows this line of questioning by examining the state of research and presents the results of current findings.

**Title:** The Leopards on Jabal Samhan  
**Original Title:** سمحان جبل في العربي ال نمر  
**Format:** Standalone Documentary  
**Category:** Ecology & Environment  
**Director:** Ole Elfenkämper & Kathrin Seward  
**Produced by:** Boekamp & Kriegsheim  
**Running Time:** 10 Minutes  
**Country:** Germany & Oman  
**Year:** 2014  
**Age Guideline:** Young Adults (17+)

*The Leopards on Jabal Samhan* is a short documentary film about the work of four wildlife rangers in the Sultanate of Oman, dedicated to save one of the rarest animals on the planet.

**Title:** Data Center – The Hidden Pollution  
**Original Title:** Internet, la pollution cachée  
**Format:** Standalone Documentary  
**Category:** Ecology & Environment  
**Director:** Coline Tison & Laurent Lichtenstein  
**Produced by:** Camicas Production  
**Running Time:** 53 Minutes  
**Country:** France  
**Year:** 2013  
**Age Guideline:** Young Adults (17+)

Essays, photos, music, bank accounts, confidential files, nowadays, the storage of computer data, whether corporate or private, has been outsourced in datacenters. These are the factories of the 21<sup>st</sup> Century and they are over 500 000 in the world today. Each click, each request creates unprecedented needs for energy. On our own PC, can we choose to use less polluting routes and datacenters? What “green” solutions can we imagine? And conversely is there a risk to see low-cost datacenters establish in emerging countries such as India or China where sanitary regulations are more accommodating?

**Title:** From Darkroom to Daylight  
**Format:** Standalone Documentary  
**Category:** Natural Science, Life Science & Technology  
 [Festival Theme 2015: Light]  
**Director:** Harvey Wang  
**Produced by:** Traveling Light Films  
**Running Time:** 63 Minutes  
**Country:** United States  
**Year:** 2014  
**Age Guideline:** Young Adults (17+)

This film explores how the dramatic change from film to digital has affected photographers and their work. Photographer Harvey Wang, who began taking pictures as a teenager, was mid-career when the tools of his

craft were made nearly obsolete with the transition to digital. Wang interviewed more than 20 important photographers and prominent figures in the field, including Jerome Liebling, George Tice, David Goldblatt, Sally Mann, Eugene Richards, Ruud van Empel, John Cohen and Jeff Jacobson, as well as Steven Sasson, who built the first digital camera while at Kodak and Thomas Knoll, who along with his brother created Photoshop.

**Title:** Race into the Future  
**Original Title:** Wettlauf in die Zukunft  
**Format:** Standalone Documentary  
**Category:** Natural Science, Life Science & Technology  
**Director:** Nanje de Jong-Teuscher  
**Produced by:** Holger Kreit  
**Running Time:** 52 Minutes  
**Country:** Germany  
**Year:** 2013  
**Age Guideline:** Young Adults (17+)

Carbon is hard as steel, but lightweight. Bioplastic is completely biodegradable. O-LED lights pose unprecedented opportunities. Three new materials that change our lives – and may lead the planet away from the energy plight. Scientists are under pressure to further develop the new materials and international companies invest huge sums in research. For the proponents agree that the new materials could make countless products more efficient.

Carbon is 80 percent lighter than steel and four times stronger than aluminum – an ideal material to make products, which depend mainly on their weight. The light of the future are the so-called O-LEDs. Lamps, which are ecologically produced and biocompatible. They can use the electricity so efficient that they turn almost 100 percent of it into light. But the production of these materials still hold difficult challenges. This film looks at the advantages, the potential and the challenges of these new materials that will transform our lives.

**Title:** Catalyst – Gut Reaction  
**Format:** Documentary Series  
**Category:** Natural Science, Life Science & Technology  
**Director:** Graham Phillips (Reporter)  
**Produced by:** Geraldine McKenna  
**Running Time:** 27 Minutes x 2  
**Country:** Australia  
**Year:** 2014  
**Age Guideline:** Young Adults (17+)

“I think this is one of the biggest developments in medical research,” was how Professor Charles Mackay described the content of our two-part documentary, Gut Reaction. The eminent University of Sydney immunologist believes that the recent discovery of hard scientific evidence that diet has a much bigger impact on health than medicine had previously realized has enormous potential for health and wellbeing. The modern Western diet seems to be contributing to not just the obvious illnesses, like heart disease, diabetes and cancer, but to many other conditions as well, from multiple sclerosis to asthma and even autism.

The scientific breakthrough that’s allowed the discovery of this new connection between diet and health is the ability, for the first time, to be able to identify the multitude of bacteria living in our guts. The job of these gut bugs is to interact with and to educate the immune system. And the key point is: the kinds of species we have living in our guts will change with diet. Eat a bad (Western!) diet and you end up with bad gut bacteria and a compromised immune system. Eat a good diet (lots of fiber, which the good gut bacteria require) and your immune system operates as it should. Gut Reaction ‘s human guinea pig, a fit, seemingly healthy young man but with a habit for “fast food”, showed how profoundly what we put in our mouths affects key health indicators.

