



News

Niti Aayog's Action Plan 'Breathe India' To Combat Air Pollution

With winter smog becoming a major health hazard every year in cities across India, Niti Aayog has developed a 15-point action plan called Breathe India for the 10 most polluted cities in India. The cities that have been identified are Kanpur, Faridabad, Gaya, Varanasi, Patna, Delhi, Lucknow, Agra, Gurugram and Muzaffarpur. Once the campaign is approved and implemented in the identified cities, it could further be replicated in other parts of the country. Niti Aayog has proposed to address the air pollution problem by prohibiting transition traffic in these cities and phasing out private diesel vehicles by 2022. Survey and analyse power plants around the most polluted cities to prioritise their.....[Read more...](#)

Date: July 17, 2018**Source:** inc42.com**Plants may soon create own fertilizer from thin air: study**

It may soon be possible to engineer plants that can develop their own fertilizer by using atmospheric nitrogen to create chlorophyll for photosynthesis, according to a team of Indian-origin researchers in the U.S. The researchers from Washington University in St. Louis engineered a bacteria that uses photosynthesis to create oxygen during the day, and at night, uses nitrogen to create chlorophyll for photosynthesis. The research, published in the journal mBio, could eliminate the use of some human-made fertilizer, which has a high environmental cost. This discovery could have a revolutionary effect on agriculture and the health of the planet, according to scientists Himadri Pakrasi and Maitrayee.....[Read more...](#)

Date: July 17, 2018**Source:** The Hindu**Plastic pollution risks 'near permanent contamination of natural environment'**

Humans have produced 8.3bn tonnes of plastic since the 1950s with the majority ending up in landfill or polluting the world's continents and oceans, according to a new report. The first global analysis of all mass-produced plastics has found that it has outstripped most other man-made materials, threatening a "near permanent contamination of the natural environment". The study by US academics found that the total amount of plastic produced – equivalent in weight to one billion elephants – will last for hundreds, perhaps thousands, of years. And with production expected to accelerate over the coming decades, campaigners warn it is creating an environmental crisis comparable to climate change.....[Read more...](#)

Date: July 19, 2018**Source:** The Guardian**'Smart plants' could soon detect deadly radon and mold in your home**

Your favorite succulent just got a little more succulent. Inspired by smoke detectors and smart home monitors, scientists are genetically engineering houseplants to sense harmful chemicals from mold and other kinds of fungi—and alert homeowners to their presence. If they can figure out how houseplants respond to other threats, such as radon and airborne pathogens, researchers could one day engineer "smart plants" to tackle a whole host of problems. The idea has already been tested on the farm, researchers write in a review published today in Science. From 2012 to 2013, plant scientists modified tobacco plants (*Nicotiana tabacum*) to produce excessive amounts of orange fluorescent protein when they encountered disease-causing bacteria. To do so, researchers first identified the genes in the tobacco plant genome that were likely to react to harmful airborne chemicals known as volatile organic compounds. Then, they inserted synthetic "promoters" into the plants' DNA to crank those reactions up to 10. When the engineered plants sensed the bacteria, their cells reacted by pumping out the orange fluorescent protein. To detect the signal, farmers simply had to put on light-filtering goggles and see whether the plants glowed orange under a green light, the researchers reported previously in Plant Biotech.....[Read more...](#)

Date: July 19, 2018**Source:** Sciencemag**World's biggest dam is fertile ground for rare plants**

On top of the 185-meter high dam of the world's largest hydroelectric project, endangered plants are having a field day. The Three Gorges area on the Yangtze River, in central China's Hubei Province, is home to many rare and endemic plants. Due to the rising water level in the reservoir and increasing human activity, many of species were under threat. To mitigate the effect on the environment, China Three Gorges Corporation has invested nearly 100 million yuan (14.8 million U.S. dollars) since 2007 to establish a rare plant research institute. The institute has two research bases that cover nearly 700,000 square meters, including two research buildings, six nurseries and six intelligent greenhouses,.....[Read more...](#)

Date: July 23, 2018**Source:** Xinhuanet

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