



Eucc Coastal News

No 6

November 2007

Eucc Coastal News is the international newsletter of the Coastal Union (Eucc) for its members and for the press. We have ca. 4000 readers.

We gratefully acknowledge a EU grant for 2007. However, the financial support of all members is still vital for this newsletter. Eucc-members are entitled to a variety of services and discounts: please check in www.eucc.net/en/members. Please transfer the appropriate amount to bank account 916 of Eucc, mentioning membership type. Name of bank: Postbank, IBAN-code: NL10 PSTB 0000 0009 16, Swift code: PSTBNL21.

Contributions to the next issue: Eucc-members are invited to send their contributions until:

19 January 2008 to: news@eucc.net (click, with apologies for anti-spam code).

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– EUCC NEWS –

1. Journal of Coastal Conservation - Planning and Management (JCC)

Springer is proud to be the new publisher of the Journal of Coastal Conservation - Planning and Management (JCC). JCC is a scientific journal for the dissemination of both theoretical and applied research on integrated and sustainable management of the terrestrial, coastal and marine environmental interface. To celebrate the publication of the first issue with Springer, we are offering free access to the journal for the next 4 weeks.

Don't miss out on... Exclusive Free Access to Journal of Coastal Conservation

A thorough understanding of both the physical and the human sciences is important to the study of the spatial patterns and processes observed in terrestrial, coastal and marine systems set in the context of past, present and future social and economic developments. This includes multidisciplinary and integrated knowledge and understanding of: physical geography, coastal geomorphology, sediment dynamics, hydrodynamics, soil science, hydrology, plant and animal ecology, vegetation science, biogeography, landscape ecology, recreation and tourism studies, urban and human ecology, coastal engineering and spatial planning, coastal zone management, and marine resource management.

Have a colleague who might be interested in this offer? Don't hesitate to forward this email on to them. Enjoy browsing and researching the content for the next four weeks!

www.springer.com/east/home?SGWID=5-102-70-173676406-0&changeHeader=true&SHORTCUT=www.springer.com/11852
www.springerlink.com/content/1400-0350

2. EUCC-NL collects €250,000 for dolphin conservation campaign

At the occasion of the Year of the Dolphin 2007, the Dutch branch of EUCC (Kustvereniging) is running a very successful campaign dolphin conservation. They were able to raise a campaign budget of € 250,000. Half of this is the result of a series of fund raising activities including a private concert of Cristina Branco and a fund raising gala (Dolphin Day Dinner). Natuurpunt, EUCC's NGO member organisation in Belgium, raised € 10,000 so far. The proceeds are used for dolphin conservation projects and awareness campaigns in the Netherlands and Belgium as well as for the international Year of the Dolphin awareness campaign coordinated by UNEP CMS.

www.yod2007.org/en/Join_in/index.html
www.dolphinfund.eu

3. Who wants to raise funds for dolphin and marine conservation in 2008?

UNEP has announced that the Year of the Dolphin campaign will be extended to 2008 because of its increasing success, especially during the last few months. With its Dolphin Fund, EUCC will again try and raise as much funds as possible for dolphin and marine conservation in 2008. Fund raising making use of the Year of the Dolphin is only allowed in agreement with UNEP or the Dolphin Fund. The experience in the Netherlands and Belgium has learnt that the Year of the Dolphin creates excellent opportunities to raise funds, as a National Partner of the Dolphin Fund (www.dolphinfund.eu). Half (50%) of the funds raised can directly be used for the costs of your fund raising activities and for your national awareness campaign. All EUCC-members with ideas for fund raising, or business partners or sponsors are encouraged to contact info@dolphinfund.eu

4. CONSCIENCE research initiative moves ahead

The Project Steering Group met, early October, to discuss and agree on ways to proceed after six-month start of the project. The preparation and finalization of relevant project reports and the set up for the framework of the pilot study areas have been largely discussed. The preliminary results and information will be made available at the website soon. Furthermore, the project website also provides access to summary information in all partner languages, such as Spanish, Romanian, Polish, Croatian and Dutch, in addition to English. The engagement of one of the participants of the Advisory Group of CONSCIENCE has resulted in the official publication of the EUROSION project final report in Italian language. This and more information is available at www.conscience-eu.org and www.eurosion.org

5. COASTGIS'07 hosted final MOTIIVE project workshop

At the recent COASTGIS conference held in Santander, Spain, between 7th-10th October, the final workshop of the MOTIIVE project took place. Particular attention has been given to issues dealing with data and information harmonisation and its relevance for coastal planners and managers and the findings of the cost benefit analysis, among others. EUCC's role has been actively

communicating about the importance of INSPIRE application in the coastal and marine environment and to facilitate stakeholders' involvement in the process. We will seek to continue this role by keeping the coastal community informed and engaged in the process of INSPIRE.

In this sense, we would like to inform about the INSPIRE Draft Implementing Rules for Metadata open for public consultation. The Rules for Metadata are now available for public view and comments. The call for comments is open until 21 December 2007. For more details please visit the INSPIRE website at http://www.ec-gis.org/inspire/public_consultations/metadata/index.cfm

Further information about the MOTIIVE project and results available at <http://www.eucc.net/en/motiive/index.htm> and www.motiive.org

– COASTAL & CLIMATE CHANGE – TRENDS & IMPACTS –

6. Oceans interact to dry Australia further

Interactions between major oceans, triggered by climate change, will produce increasingly dry conditions in southern parts of Australia for decades to come, projections by the country's main science organisation show. Further projected decreases in rainfall in southwest and southeast Australia could be arrested if carbon dioxide emission increases were halted, but a full recovery would take around 600 years, Dr Wenju Cai, a leading scientist with the government-backed Commonwealth Scientific and Industrial Research Organisation (CSIRO) said. "The recovery takes a long, long time.... Not in our lifetime," Cai said. As it stands, the CSIRO is confidently forecasting a further 10-15 percent decline in rainfall in southeast Australia and a decline of over 20 percent in southwest Australia by 2050. Cai, a senior CSIRO scientist who specialises in marine and atmospheric research, said in an interview that Australia was presently being affected by the conflicting influences of a "wet weather" La Nina event in the Pacific and a "dry weather" Indian Ocean Dipole effect in the west. The Indian Ocean effect was showing itself to be the stronger, replicating results in 1967 when a weak Pacific La Nina was overwhelmed by the Indian Ocean and Australian rainfall dried up to 40 percent less than average. This explained the puzzling lack of rain which has accompanied the formation of a La Nina this year, dashing hopes after last year's El Nino produced one of the worst droughts on record. La Nina events typically produce wet weather in eastern Australia and Southeast Asia from warming Pacific sea temperatures. El Ninos produce opposite effects. Cai said greenhouse gases were now likely to create such conditions more often as they warmed the dry Australian landmass faster than the ocean. Cai calls the overall effect a "three-headed dog", made up by the Indian Ocean Dipole, the Southern Annular Mode shifting westerlies southward, and increasingly powerful El Nino events. Together the three effects are threatening permanent closure for many southern farmlands, already on the brink in the driest inhabited continent in the world.

www.planetark.com/dailynewsstory.cfm/newsid/44719/story.htm

www.csiro.au/news/AustralianRainfallFuture.html (findings Dr. Cai)

www.csiro.au/ (general)

7. Earth getting wetter and stickier, researchers say

Greenhouse gases are making the earth's atmosphere wetter and stickier, which may lead to more powerful hurricanes, hotter temperatures and heavier rainfall in tropical regions, British researchers reported on October 10. The findings, published in the journal Nature, are some of the first to show how human-produced greenhouse gases have affected global humidity levels in recent decades and could offer clues on future climate change, the researchers said. The British team collected data from weather stations, buoys and ships across the world to measure the effect of rising greenhouse gases on humidity between 1973 and 1999. A computer simulation showed that natural events such as volcanoes and variations in the sun's brightness could not alone have produced the increase in humidity, and pointed to greenhouse gases generated by humans. The findings are especially important for tropical regions, which will see the largest increase in humidity because they are warm already. The research also provides a better understanding of potential changes in the earth's water cycle, which could result in floods and droughts that have an even bigger impact on people than rising temperatures.

www.planetark.com/dailynewsstory.cfm/newsid/44786/newsDate/11-Oct-2007/story.htm

www.nature.com/news/2007/071010/full/news.2007.158.html

www.nature.com/nature/journal/v449/n7163/abs/nature06207.html (abstract)

www.pnas.org/cgi/content/abstract/104/39/15248 (abstract)

<http://news.bbc.co.uk/2/hi/science/nature/7038278.stm>

8. Greenhouse gas emissions hit danger mark – scientist

The global economic boom has accelerated greenhouse gas emissions to a dangerous threshold not expected for a decade and could potentially cause irreversible climate change, said one of

Australia's leading scientists. Tim Flannery, a world recognised climate change scientist and Australian of the Year in 2007, said a UN international climate change report due in November will show that greenhouse gases have already reached a dangerous level. Flannery said the Intergovernmental Panel on Climate Change (IPCC) report will show that greenhouse gas in the atmosphere in mid-2005 had reached about 455 parts per million of carbon dioxide equivalent - a level not expected for another 10 years. He said the measurement of greenhouse gas in the atmosphere included not just carbon dioxide, but also nitrous oxide, methane and hydrofluorocarbons (HFCs). All these gases were measured and then equated into potentially one gas to reach a general level. "They're all having an impact. Probably 75 percent is carbon dioxide but the rest is that mixed bag of other gases," he said. Flannery said global economic expansion, particularly in China and India, was a major factor behind the unexpected acceleration in greenhouse gas levels.

www.planetark.com/dailynewsstory.cfm/newsid/44759/newsDate/10-Oct-2007/story.htm
www.theweathermakers.com/ (Flannery's book)

9. Despite warming, ships to shun Northwest Passage

While there has been much talk that Arctic trade routes will open up as northern ice melts, shipping companies and experts say using the fabled Northwest Passage through Canada's Arctic archipelago would be too difficult, too dangerous and totally impractical. In theory, the idea is tempting - the passage cuts the distance between Europe and the Far East to just 7,900 nautical miles (14,630 km), from 12,600 nautical miles through the Panama Canal. Yet few predict vessels will steam through the Passage in any great numbers. The highly unpredictable nature of Arctic ice, a total lack of infrastructure, narrow channels, relatively shallow waters, increased insurance costs and the unwillingness of firms to take risks are all to blame. "No one in the industry is really talking about the Northwest Passage being a serious alternative to the Panama Canal, even if it does open up at all," said Simon Bennett, secretary of the International Chamber of Shipping in London. Even if the ice does melt in summer the season would be very brief, perhaps from late June to late September. Then the long dark winter starts drawing in and ice forms again. And just because there is no ice in the passage one summer is no guarantee it will not return the next - a factor which does little to assuage vessels seeking reliable routes.

www.planetark.com/dailynewsstory.cfm/newsid/44652/newsDate/4-Oct-2007/story.htm
www.planetark.com/dailynewsstory.cfm/newsid/44632/newsDate/3-Oct-2007/story.htm
<http://news.bbc.co.uk/2/hi/science/nature/7044808.stm>

Some historical perspective offered by renowned British historian Lisa Jardine:

http://news.bbc.co.uk/2/hi/uk_news/magazine/7064217.stm

10. Arctic explorers to chart sea ice melt

Three British polar explorers will set off from Alaska early next year on a trek to the North Pole to try to establish when Arctic summer sea ice will finally vanish because of global warming. Estimates of final total disappearance of the summer sea ice range from 16 to 100 years, and the aim of the four-month expedition starting in February is to fine-tune that by getting accurate readings of the ice's thickness from the surface. The three - Hadow, Ann Daniels and Martin Hartley - will walk, swim and ski the 2,000 km (1,250 miles) route over some of the toughest terrain in the world in temperatures down to minus 50 Celsius (minus 58 Fahrenheit) towing behind them an ice-penetrating impulse radar. The specially designed radar will measure and transmit readings of the depth of snow and underlying ice every 20 centimetres (8 inches) - meaning that during the journey it will have taken 10 million readings. Although it will take years for scientists to analyse the data, Hadow said the team hoped that when they reach the North Pole in early June they would be able almost immediately to give a preliminary estimate.

www.planetark.com/dailynewsstory.cfm/newsid/44863/newsDate/17-Oct-2007/story.htm
<http://news.bbc.co.uk/2/hi/science/nature/7036058.stm>

11. 'Warm wind' hits Arctic climate

The Arctic is being hit by melting ice, hotter air and dying wildlife, according to a US government report on the impact of global warming there. A new wind circulation pattern is blowing more warm air towards the North Pole than in the 20th Century, scientists found. Shrubs are now growing in tundra areas while caribou herds are dwindling in Canada and parts of Alaska. The report stresses that the fate of the Arctic affects the entire planet. The US National Oceanic and Atmospheric Administration (Noaa) report found that in 2007 winter and spring temperatures were "all above average throughout the whole Arctic and all at the same time" unlike in previous years. "This is an unusual feature and it looks like the beginning of a signal from global warming," the Noaa's James Overland told reporters. Scientists have expected polar regions to feel the first impacts of global

warming, and the 2006 US State of the Arctic report provided a benchmark for tracking changes. The October 17 report was the first update on it.
<http://news.bbc.co.uk/2/hi/science/nature/7050132.stm>
www.noaanews.noaa.gov/stories2007/20071017_arcticreportcard.html

12. Oceans are soaking up less CO₂, research shows

The world's oceans appear to be soaking up less carbon dioxide, new environmental research has shown, a development that could speed up global warming. A 10-year study by researchers from the University of East Anglia has shown that the uptake of CO₂ by the North Atlantic ocean halved between the mid-1990s and 2002-2005. "Such large changes are a tremendous surprise," said Dr Ute Schuster, who will publish the findings with professor Andrew Watson in the Journal of Geophysical Research next month. "We expected that the uptake would change only slowly because of the ocean's great mass." There is also evidence of a slowdown in the uptake of CO₂ by the Southern ocean, although it is not as great or as sudden as in the North Atlantic. The scientists based their findings on data collected by merchant ships fitted out with equipment to automatically measure the levels of carbon dioxide in the water. The oceans are one of two major carbon "sinks" for CO₂ emissions, the other being the land biosphere, which together absorb about half of all CO₂ emitted into the atmosphere. If the oceans soak up less CO₂, it means CO₂ levels in the atmosphere will rise much faster and the climate could warm more rapidly, the researchers said in a statement.

www.planetark.org/dailynewsstory.cfm/newsid/44922/newsDate/22-Oct-2007/story.htm

Another very similar research project comes to the same conclusions, see

'Unexpected growth' in CO₂ found

<http://news.bbc.co.uk/2/hi/science/nature/7058074.stm>

www.pnas.org/cgi/content/abstract/0702737104v1?maxtoshow=&HITS=10&hits=10&RESULTFORMAT=&fulltext=Pep+Canadell&searchid=1&FIRSTINDEX=0&resourcetype=HWCIT (abstract)

www.pnas.org/cgi/reprint/0702737104v1?maxtoshow=&HITS=10&hits=10&RESULTFORMAT=&fulltext=Pep+Canadell&searchid=1&FIRSTINDEX=0&resourcetype=HWCIT (the article in PDF)

13. Rising seas threaten Africa's coastline - UN body

Africa's coastal infrastructure faces increasing danger of erosion from rising sea levels caused by climate change, the head of the UN Environment Programme said on November 8. Achim Steiner, executive director of UNEP, told a news conference that port facilities, refineries and expensive private properties were already degrading as a result of global warming. Scientists have said Africa will suffer most if the world fails to halt global warming, with parts of the poverty-stricken continent becoming uncultivable or uninhabitable. In September, the British government's chief scientific adviser, David King, said climate change, if unchecked, would lead to worsening drought in Africa and flooding along much of its coast. King said an additional 70 million Africans could be at risk of hunger by the 2080s as a result of global warming.

www.planetark.org/dailynewsstory.cfm/newsid/45229/story.htm

[http://en.wikipedia.org/wiki/David_King_\(scientist\)](http://en.wikipedia.org/wiki/David_King_(scientist)) (over David King)

Incidentally, David King is retiring from his position as chief scientific adviser, see

<http://news.bbc.co.uk/2/hi/science/nature/7113199.stm>

14. Climate change could diminish drinking water more than expected

As sea levels rise, coastal communities could lose up to 50 percent more of their fresh water supplies than previously thought, according to a new study from Ohio State University, announced on November 17. Hydrologists there have simulated how saltwater will intrude into fresh water aquifers, given the sea level rise predicted by the Intergovernmental Panel on Climate Change (IPCC). The IPCC has concluded that within the next 100 years, sea level could rise as much as 23 inches, flooding coasts worldwide. Scientists previously assumed that, as saltwater moved inland, it would penetrate underground only as far as it did above ground. But this new research shows that when saltwater and fresh water meet, they mix in complex ways, depending on the texture of the sand along the coastline. In some cases, a zone of mixed, or brackish, water can extend 50 percent further inland underground than it does above ground. Like saltwater, brackish water is not safe to drink because it causes dehydration. Water that contains less than 250 milligrams of salt per litre is considered fresh water and safe to drink

<http://researchnews.osu.edu/archive/saltwatr.htm>

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– COASTAL & CLIMATE CHANGE – RESPONSES –

15. Gaia guru urges ocean pipes to fix Earth's climate

A series of giant pipes in the oceans to mix surface and deeper water could be an emergency fix for the Earth's damaged climate system, the scientist behind the Gaia theory said on September 26. James Lovelock, whose Gaia hypothesis that planet Earth is a living entity has fuelled controversy for three decades, thinks the stakes are so high that radical solutions must be tried - even if they ultimately fail. In a letter to the journal *Nature*, he proposes vertical pipes 100 to 200 metres long and 10 metres wide be placed in the sea, so that wave motion pumps up water and fertilises algae on the surface. This algal bloom would push down carbon dioxide levels and also produce dimethyl sulphide, helping to seed sunlight-reflecting clouds. "If we can't heal the planet directly, we may be able to help the planet heal itself," Lovelock, of the University of Oxford, and co-author Chris Rapley, from London's Science Museum, said. The two scientists argued it was unlikely any of the well-intentioned technical or social schemes for limiting carbon would restore the planet's status quo.

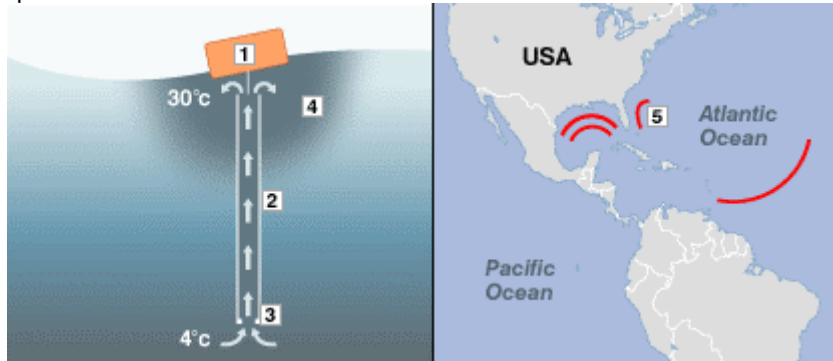


Figure: How the pumps might work

1. Buoy: Helps hold the pump in position
2. Pump: James Lovelock believes the tubes would be about 100m long to access deep cold water, and 10m wide; Phil Kithil thinks 200m long and 3m wide could be optimum
3. Valve: Could be at the top or bottom of the pipe; top perhaps preferable for maintenance. Water is drawn through the open valve on wave down slopes; no external power needed
4. Cold water: On wave up slopes, cool water spills out of the pump
5. Pump sites: Locations could also be chosen to reduce hurricane risk by cooling surface waters

www.planetark.com/dailynewsstory.cfm/newsid/44545/newsDate/27-Sep-2007/story.htm
<http://news.bbc.co.uk/2/hi/science/nature/7014503.stm>

The idea of placing pipes in the oceans is not new. There are already several projects for it, aiming at energy production, see

www.atmocean.com/

It may also be doubted that the pipes will work in the manner envisaged by Lovelock and Rapley. There will very likely be problems with keeping the valves functioning, and with controlling de algae growth in de pipes.

16. Endangered islands sound climate change alarm

Small islands, home to 5 percent of the world's population, could disappear under rising oceans as the Earth warms, delegates from 37 small island states warned on September 24. "As the proverbial canary in the coal mine, small island states have repeatedly raised the alarm bells of global warming over the last 15 years," Solomon Islands Foreign Minister Patteson Oti told a news conference. He said the Solomon Islands and members of the Alliance of Small Island States faced a future of more violent storms, depleted fish stocks, bleached coral reefs and even annihilation if the world fails to deal with climate change. The alliance comprises 37 UN members and six observers from all the oceans and major seas. The group is meeting on the sidelines of a UN conference on climate change to raise awareness and funds for island states' plight.

www.planetark.com/dailynewsstory.cfm/newsid/44508/newsDate/26-Sep-2007/story.htm

www.planetark.com/dailynewsstory.cfm/newsid/44591/newsDate/2-Oct-2007/story.htm

www.planetark.org/dailynewsstory.cfm/newsid/45209/newsDate/8-Nov-2007/story.htm

www.planetark.com/dailynewsstory.cfm/newsid/45328/newsDate/15-Nov-2007/story.htm

www.planetark.com/dailynewsstory.cfm/newsid/45329/newsDate/15-Nov-2007/story.htm

17. An ethics code for ocean carbon experiments

Scientists and entrepreneurs alike are abuzz over iron fertilization, a controversial technique that uses iron-seeded plankton to sequester atmospheric carbon for centuries deep underwater. Now, a

San Francisco-based climate startup called Climos has proposed a code of conduct to address contentious aspects of how experiments are conducted. Some researchers envision the technique as an effective way to sequester billions of tons of carbon deep in the ocean for decades or even centuries. By dumping iron dust into the ocean, the thinking goes, scientists could stimulate the growth of plankton, for which iron is a limiting nutrient. As a plankton bloom grows, its carbonaceous waste would sink to a depth of roughly 500 meters or more. A number of medium scale experiments unrelated directly to climate change have confirmed that iron catalyzes the proliferation of plankton. But these studies weren't designed to determine whether greenhouse gases apart from CO₂ could be produced as an unwanted side effect, or whether scaling up the experiments to sequester millions of tons of carbon would damage ecosystems. The prospect of selling carbon credits earned through iron dumps has attracted a number of commercial ventures, including Climos. But critics, including some leading oceanographers, say corporate profits could taint research, or that the risks, which could include the growth of harmful algal blooms, outweigh the possible benefits. That's where the new code of conduct comes in. The 2-page document calls on anyone doing experiments to protect the marine environment by obtaining permits from relevant authorities, do full environmental assessments, and avoid sensitive ecosystems. It calls for openness through release of data, third party verification of carbon uptake, and collaboration with the broader scientific community.

<http://sciencenow.sciencemag.org/cgi/content/full/2007/1010/2>

18. Convention discourages ocean fertilization

The parties to the London Convention, an international treaty that governs ocean pollution, have agreed during a meeting from 5 to 9 November that large-scale ocean 'fertilization' isn't yet justified, given gaps in scientific knowledge. The convention, which regulates activities such as the dumping of garbage at sea, had not previously taken a stand on the notion of throwing nutrients into the ocean with the intention of promoting plankton growth. The fertilization of algae growth has been mentioned as a possible countermeasure to CO₂ production, but the Convention 'scientific groups' warned in July that far too little is known on possible environmental side effects. Source: Dutch paper NRC Handelsblad, November 13, 2007.

www.nature.com/news/2007/071112/full/news.2007.230.html

www.imo.org/includes/blastDataOnly.asp/data_id%3D20395/Pressbriefing16-11-07.doc

19. British report calls for national marine agency

A British parliamentary committee called on October 18 for the creation of a national marine science agency to take responsibility for all aspects of the use and conservation of the seas in the light of global warming. The report, Investigating the Oceans, from the all-party Science and Technology Committee said the new overarching agency should supersede the current inter-agency coordinating committee and greatly broaden its scope. The report said the agency should co-ordinate marine science throughout Britain, promote marine science education, engage with industry and smooth British involvement in international organisations. It said the agency should also co-ordinate ocean monitoring and observations, particularly in view of the climate crisis. The report, which attacks the government's record on marine conservation and planning, comes as the government ends public consultations on a draft Marine Bill which should be presented to parliament early next year.

www.planetark.com/dailynewsstory.cfm/newsid/44896/story.htm

http://news.bbc.co.uk/2/hi/uk_news/7050053.stm

http://news.bbc.co.uk/2/hi/uk_news/7050053.stm

There are also calls for a special climate minister, see

www.planetark.com/dailynewsstory.cfm/newsid/45036/newsDate/29-Oct-2007/story.htm

20. Britain publishes climate change bill

The British government published its Climate Change Bill on November 15, starting a parliamentary process that could lead to a legal limit on national carbon emissions within six months. The bill sets a target of cutting national emissions of climate-warming carbon dioxide by 60 percent by 2050 and about half that by 2025. It would make Britain the first country to adopt such a legally binding commitment. Environmentalists and many politicians had campaigned for a higher goal of 80 percent and annual targets on the way. But the government has rejected annual targets in favour of rolling five-year "carbon budgets" and has until recently ruled out raising the end goal above 60 percent.

www.planetark.com/dailynewsstory.cfm/newsid/45372/story.htm

21. Nordic nations sound alarm over melting Arctic

Nordic nations sounded the alarm on October 31 about a quickening melt of Arctic ice and said the thaw might soon prove irreversible because of global warming. Sweden, Finland, Denmark, Norway and Iceland also urged all governments to agree before the end of 2009 a broader UN plan to curb greenhouse gases in succession to the Kyoto Protocol. They noted the ice on the Arctic Ocean shrank in September to 4.13 million sq km (1.6 million sq miles), the smallest since satellite records began in 1979 and far eclipsing the low in 2005. The ice extent is now expanding as winter approaches. The melt, blamed by the UN climate panel on heat-trapping gases emitted by burning fossil fuels, threatens the livelihoods of indigenous hunting peoples and wildlife such as polar bears and seals. Swedish Environment Minister Andreas Carlgren said the thaw of the Arctic ice might already have reached a point of no return. "We may have passed the tipping point," he said.
www.planetark.com/dailynewsstory.cfm/newsid/45097/newsDate/1-Nov-2007/story.htm

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– NATURE AND CONSERVATION –

22. Russian oil tanker breaks up off Crimea – “environmental catastrophe”

A severe storm broke a small Russian oil tanker in two off the Ukrainian port of Kerch on November 11, spilling up to 2,000 tonnes of fuel oil in what a Russian official said was an "environmental disaster". The same storm in the Black Sea and Azov Sea also sank four freighters, three carrying sulphur and one with a cargo of scrap metal. The heavy seas also cracked the hull of another oil tanker, but the ship was afloat and not leaking. The 1978-built tanker, designed primarily for inland and coastal service, was carrying 4,000 tonnes of fuel oil in total when it was hit by the storm, which has knocked out electricity supplies to much of Crimea. The likely effects of the spill were not immediately clear. A spill over 700 tonnes is considered large, but the biggest ones run into the tens or even hundreds of thousands. The polluted area is at the heart of the migration route from central Siberia into the Black Sea of red-throated and black-throated Siberian divers. The area is also home to porpoises. The same storm, which was expected to rage for up to 3 days, also sank a freighter with scrap metal off Sevastopol in southern Crimea. Two of its crew were rescued, but the fate of the other 15 was unknown, Ukraine's emergencies ministry said. The oil spill into the Black Sea is killing dolphins and the nearby Sea of Azov may suffer heavy pollution if urgent measures are not taken, Russia's environment watchdog Rosprirodnadzor said on November 15. On November 21 officials said Russia will limit oil products shipments by river in 2008 after the fuel oil spill, which has already caused US\$267 million damage. Also, sulphur started leaking from two ships that sank during the storm, it was reported.
www.planetark.com/dailynewsstory.cfm/newsid/45250/newsDate/12-Nov-2007/story.htm
www.planetark.com/dailynewsstory.cfm/newsid/45317/newsDate/14-Nov-2007/story.htm
www.planetark.com/dailynewsstory.cfm/newsid/45355/story.htm
www.planetark.com/dailynewsstory.cfm/newsid/45439/newsDate/21-Nov-2007/story.htm
www.planetark.com/dailynewsstory.cfm/newsid/45471/newsDate/22-Nov-2007/story.htm

23. Russia becoming largest supplier wild marine mammals in the world

The Russian Federation is rapidly becoming the largest supplier of wild marine mammals to facilities around the world. As well as being a supplier of animals, the vast country has several of its own captive dolphin and whale facilities. The nature of the Russian Federation as a difficult country to gain access to and filter information from has meant that for many years, companies have been able to capture, display and export marine mammals without any monitoring or consequence. Marine mammals including, but not limited to, beluga whales, Black Sea dolphins, walrus and seals have all been regularly captured and this continues within some Russian facilities. It has been reported that there have been no historical or current population assessments for Russian beluga whales and the case is similar for other animals such as Black Sea dolphins. Nevertheless, facilities in the Russian Federation continue to capture these animals and then export them all over the world. One notorious Russian company, Utrish dolphinarium Ltd., to this day supplies wild marine mammals to facilities around the world. As well as walrus and seals, Utrish captures wild beluga whales and dolphins from the Black Sea.
www.marineconnection.org/campaigns/russianfederation.htm

24. UK eyes controversial Severn tidal power scheme

Britain has launched a study into possibly building a giant hydro-electric barrier across the Severn Estuary between England and Wales, angering conservationists who said it would harm fish and

birds. John Hutton, secretary of state for business, said the government would immediately start studying the feasibility of a barrage, which would be powered by the tide and could provide 5 percent of Britain's power needs. At around 8.6 gigawatts, it would put out more power than six of the next generation nuclear power stations currently under consideration in the UK. Carbon-free power is essential to help Britain meet its goal of cutting CO₂ emissions 20 percent below 1990 levels by 2020, but some conservationists say the local damage caused by such a barrage would outweigh the wider benefits. Thousands of birds, spawning salmon and other fish will be put at risk, the Royal Society for the Protection of Birds (RSPB) said. The estuary has the second highest tidal range in the world at more than 14 metres, and is home to around 65,000 birds during winter, said the RSPB. The Renewable Energy Foundation welcomed the study, and described the barrier as a "strategically significant asset".

www.planetark.com/dailynewsstory.cfm/newsid/44526/newsDate/26-Sep-2007/story.htm
www.rspb.org.uk/news/details.asp?id=tcm:9-171364

25. Underwater power plan for coast off Pembrokeshire

Tidal powers scheme's are also being developed for other parts of Wales. Two energy companies are developing plans to build an underwater tidal power station off Pembrokeshire. Eon UK and Lunar Energy have submitted their proposal for the project near St Davids to the UK government. The companies say generators powered by the rise and fall of the tide could produce electricity for 5,000 homes. The environmental group Friends of the Earth Cymru said it was in favour of the plant "in principle" so long as it did not have an adverse impact on the marine environment. The two companies said they had completed a feasibility study and have submitted a "scoping report" outlining their intentions to the Department of Business, Enterprise and Regulatory Reform. They are now required to produce detailed environmental impact assessments to accompany a future planning application. Of course they will have to ensure that the environmental safeguards are met. If approved, the companies say the plant could be operational within three to four years. Amaan Lafayette of Eon UK said: "The waters off the coast of Wales have some of the greatest potential for marine-generated energy in Europe. "This project will help us to harness the power of the tides and turn that potential into the clean, renewable energy we need to help fight the effects of climate change. "If it gets the go-ahead, this scheme will be one of the largest tidal stream projects of its kind in the world."

http://news.bbc.co.uk/2/hi/uk_news/wales/south_west/7070821.stm

26. Ships asked to avoid whale route

The endangered right whale is to get extra protection after a safe haven from shipping was set aside off Nova Scotia in Canada. The International Maritime Organization (IMO) ratified a Canadian proposal to designate the 1,800-sq-km zone an "Area to Be Avoided" at a meeting in Denmark. The voluntary restriction asks ship captains to steer around the area. Collisions with container ships are seen as a key threat to right whales, thought to number just 400. The new zone is in the Roseway Basin, south of the Canadian province of Nova Scotia. It is close to a major shipping route between North America and Europe, and scientists say the slow-moving mammals have been killed in collisions with huge cargo vessels. The restrictions will apply between 1 June and 31 December, when whales are known to congregate in the area.

<http://news.bbc.co.uk/2/hi/americas/7039209.stm>

27. Israel: rethinking desalinated water quality and agriculture

Damage to crops after irrigation with extremely pure water from the world's largest reverse-osmosis desalination plant reveals a need for revised treatment standards. A group of Israeli scientists state this after evaluating the use of desalinated water produced by the big desalination installation based on reversed osmosis in Ashkelon on the Mediterranean, in use since December 2005. This installation produces 100 million cubic metres of water annually. It is primarily intended to be sold as drinking water, but due to a low rate of consumption a considerable part of the water is sold to farmers. The evaluation of the scientists showed that this water used in pure form causes considerable damages to crops, unless it is first treated with an expensive after treatment. The desalinated water contains much to high levels of borium (B), to much magnesium is filtered out, harming crop growth and so are calcium and sulphurs essential for healthy crop growths. These elements and minerals need to be added, but as mentioned this is expensive, especially if the desalinated water also continues to be used as drinking water.

Source: Dutch paper NRC Handelsblad, 10 November 2007

www.sciencemag.org/cgi/content/summary/318/5852/920 (article not free)

28. Israel builds Red Sea concrete reef to lure divers

Israeli scientists are building a giant concrete reef to lure more divers and snorkellers to the Red Sea without endangering one of the world's most diverse coral communities. Thousands of divers and snorkellers flock to the popular Israeli Red Sea resort of Eilat to marvel at the spectacular ocean life attracted by its coral reefs. But intensive diving is damaging the reef and researchers want to protect nature without restricting tourism in a country already battling television images of bombs and bloodshed. The solution? A contraption the size of a small house, made up of six concrete blocks weighing 4 tonnes each. Hulking blocks of concrete might not appeal to divers used to weaving between wild, multi-coloured plant life. But after just a few months in the water the reef has attracted more than 20 species of fish. The artificial reef, near Eilat's popular Coral Beach diving spot, was started as an experiment but researchers say if it proves a hit with divers and protects the reef, it could be replicated elsewhere.

www.planetark.com/dailynewsstory.cfm/newsid/44808/story.htm

29. Israel's Mediterranean: a "septic tank"?

The Mediterranean is often called the world's most polluted sea and the waters around Tel Aviv offer a reason why. Heavy metals and pesticides are discharged into the sea under government licences, environmentalists say, and the company responsible for the sewage of the area's 2.5 million people is the biggest polluter in the eastern Mediterranean. "The state of Israel's coastal waters is appalling," the environmental group Zalul said in its State of the Sea Report for 2007. After a successful battle against fish cages destroying the coral reefs of the Red Sea, Zalul is focusing its clean-up fight on wastewater permits issued by a government committee. Discharged into the sea every year with the committee's authorisation are 140 tons of heavy metals, 130 tons of pesticides, 5 tons of arsenic, 1,300 tons of ammonia and a ton of cyanide, the Zalul report said. The Israeli Environmental Protection Ministry said Zalul's report was not accurate and beaches were much cleaner than they used to be. The most recent United Nations report on the Mediterranean ranked the greater Tel Aviv area as one of the 10 most polluting urban centres in the Mediterranean. Israel's largest polluter is the Shafdan, or the Dan Region Association of Towns for Sewage and Environmental Issues. It is responsible for the sewage of the greater Tel Aviv area, consisting of 26 municipalities. Ironically, a government proposal to help clean up the polluted Kishon River in northern Israel could increase the problems in the Mediterranean. The plan calls for a pipeline to take waste from the factories along the river, including Israel's biggest oil refinery, and spill it directly into the sea.

www.planetark.com/dailynewsstory.cfm/newsid/44879/newsDate/18-Oct-2007/story.htm

www.zalul.org/upimg/-%20zalul%20english%202007%20sea%20report.pdf

www.zalul.org/en/zmap/default.htm

30. Aegean Sea in danger due to growing pollution levels

Pollution threatens to turn Greece's Aegean Sea into another Adriatic Sea, warned Theodoris Tsihidis of the environmental group Archipelagos. The contamination comes from two main sources: heavy ship traffic that dumps oil and other wastes and land-based discharges, such as farm runoff and sewage, from rivers that empty into the ocean. The source of the problem lies on land. In 2007, most Greek cities and towns were not properly processing their urban and industrial waste, poisoning the water table and marine environment. It is no coincidence that eutrophication (a proliferation of plant life, especially algae, which reduces the dissolved oxygen content and often causes the extinction of other organisms) has been observed in both the Thermaic and Saronic gulfs. Pollution has also been exacerbated by the proliferation of coastal tourism resorts without any accompanying infrastructure projects. Throughout the Greek islands, there are fewer than 10 waste-processing plants in full operation. The remainder, where they exist, are either underperforming or inactive. Also a danger to the sea are the dozens of open garbage dumps throughout the islands where waste is incinerated. After rain, huge quantities of toxic waste ends up in the sea. The Aegean also faces a threat from the east. Izmir, on Turkey's Aegean coast, is the largest source of industrial waste in that region and rampant construction over the past 10 years in Kusadasi has been an obstacle to creating the proper infrastructure for sustainable waste management. Several rivers that flow down through northern Greece from Balkan countries also channel industrial waste into the sea.

www.ekathimerini.com/4dcgi/news/content.asp?aid=87764

31. Jordan wants Chinese help for Dead Sea canal plan

Jordan would like China's help in building a planned canal from the Red Sea to top up falling water levels in the Dead Sea, a Jordanian official said on November 2. Jordan, Israel and the Palestinians agreed in December to proceed with a feasibility study of the US\$2-\$4 billion project. "Chinese companies have the capability to implement such a big project," Maen Nsour, Chief Executive

Officer of the Jordan Investment Board, told a news conference in Beijing. "They have the potential to help build the waterway from the Red Sea to the Dead Sea." He did not elaborate. France, the United States, the Netherlands and Japan have so far signalled their willingness to contribute to the cost of the two-year study. Nsour was speaking after a visit to China by Jordan's King Abdullah during which Beijing agreed to help develop nuclear power projects in the Middle Eastern country. www.planetark.org/dailynewsstory.cfm/newsid/45156/newsDate/5-Nov-2007/story.htm

32. Dozens of endangered falcons shot in Cyprus

Fifty-eight endangered falcons have been shot dead in Cyprus, a wildlife conservationist group said on October 24. The birds, along with spent cartridges normally used in clay pigeon shooting, were found on Oct. 4 in the south-west of the island. Cyprus is an important migratory route for birds. Conservationists estimate about 100 million migratory birds pass over the Mediterranean island to and from continental Europe each year.

www.planetark.com/dailynewsstory.cfm/newsid/44984/newsDate/25-Oct-2007/story.htm

33. Baltic: HELCOM group meets to discuss new pollution trends

The Helsinki Commission Monitoring and Assessment Group (HELCOM MONAS) met during week 42 in Helsinki to present new information on sources and quantities of inputs of harmful substances into the Baltic Sea, and their effects on the state of the marine environment. The meeting finalised a set of new and updated indicator fact sheets showing the current trends in pollution loads and their environmental impacts on Baltic ecosystems. The Member States of HELCOM are set to adopt an ambitious overarching action plan to put an end to further destruction of the Baltic Sea and restore its good ecological status by 2021. The plan is almost fully complete, and with only minor changes expected in the final version it will be adopted at the upcoming meeting of the ministers of the environment of the Baltic Sea coastal countries scheduled for 15 November in the Polish city of Krakow. The holistic Baltic Sea Action Plan is designed to solve all major environmental problems affecting the Baltic Sea. Of the many environmental challenges, the most serious, and proving difficult to tackle with conventional approaches, is the continuing eutrophication of the Baltic Sea, caused by excessive nutrient pollution loads of nitrogen and phosphorus to the sea originating from agriculture and untreated sewage. This leads to problems like increased algae blooms, murky waters, oxygen depletion and lifeless sea bottoms. Compared to pristine conditions in the 19th century, nitrogen input to the Baltic Sea has increased ninefold, resulting in extensive summer algal blooms, as can be seen almost everywhere in the main basin of the Baltic Sea.

Source: Water21 Global News Digest

www.helcom.fi/press_office/news_helcom/en_GB/HOD24_outcome/

34. Sweden wants more eco-studies of Baltic gas link

Sweden demanded on October 31 more studies on the environmental impact of a planned US\$7 billion gas pipeline under the Baltic Sea, throwing up a new obstacle to the strategic Russian-German project. Baltic-rim countries have voiced concern the pipeline, due to bring more Russian gas to resource-hungry Germany and western Europe from 2010, may damage the environment by running through waters containing chemical waste and munitions. The plan is also frowned upon for political reasons by the Baltic states and Poland, who say the Nord Stream link could allow Moscow to cut flows through land pipelines to western Europe that also supply the transit countries with energy. Swedish Environment Minister Andreas Carlgren said Nord Stream, set up by Russia's Gazprom, German BASF and E.ON to build and run the pipe, intended to submit its analysis to Stockholm in December. Sweden said the proposed route of the pipeline runs through natural reserve areas protected by European Union rules and near hazards left over from 20th century wars. Carlgren said a safer alternative could be a more eastern route, which would effectively shift the link south and possibly into the territorial waters of the Baltic states. But such a plan could also run into trouble. Last month Estonia rejected an application to survey its Baltic seabed, forcing Nord Stream to re-route the planned 27.5 billion cubic metres (bcm) per year pipeline further north through Finnish waters. Finland backs more gas transport capacity between Russia and western Europe and it assessing possible environmental risks. Despite German attempts to allay fears, the Baltic countries and Poland, former Moscow satellites with cool relations with Moscow, remain sceptical and want alternative routes for the link, possibly over land. The Nord Stream project is key to Gazprom's strategy of diversifying export routes after its pricing disputes with Ukraine and Belarus led to cuts in gas and oil deliveries to Europe over the past two years. The pipe is scheduled to come on stream in 2010, with a second planned line to double capacity to 55 bcm per year later.

www.planetark.com/dailynewsstory.cfm/newsid/45111/newsDate/1-Nov-2007/story.htm

35. US scientists warn of threat to deep-water reefs

US scientists are warning of an environmental threat to deep-water coral reefs after finding they may be just as vulnerable to pollution as their shallow-water counterparts. For the past three decades, scientists at the US National Oceanic and Atmospheric Administration have observed an alarming decrease in live coral cover on shallow reefs in the Caribbean. The shallow beds of biologically rich coral are often close to land and were thought to be more susceptible to degradation caused by sewage and other human-related pollutants than deeper, more remote offshore reefs. In a report published in this month's issue of *Continental Shelf Research*, however, a team of NOAA scientists said they had documented, for the first time, a pattern of coral loss on a deep-water US Caribbean reef. The destruction was observed on a reef off St. John in the US Virgin Islands by NOAA scientists using a remotely operated submersible vehicle (ROV) during a sea floor mapping mission in 2005. Mark Monaco, a marine biologist from NOAA's Center for Coastal Monitoring and Assessment, said the loss of coral on the deep-water reef was especially worrisome because such reefs were traditionally thought to serve as a potential source of regeneration of pollution-depleted shallow reefs. "Considering the lack of data on deep reefs there is a critical need to map and monitor their condition and investigate possible ecological linkages with shallow reefs," Monaco said.

www.planetark.com/dailynewsstory.cfm/newsid/44861/newsDate/17-Oct-2007/story.htm
www.noaanews.noaa.gov/stories2007/20071016_deepcoral.html

36. Rare "Pink Dolphin" photos

This extremely rare and beautiful "pink dolphin" was spotted and photographed by Capt. Erik Rue of Calcasieu Charter Service on June 24th, 2007 during a charter fishing trip on Calcasieu Lake south of Lake Charles, LA.



It appears to be an uncanny freak of nature, an albino dolphin, with reddish eyes and glossy pink skin. It is small in comparison to the others it is traveling with and appears to be a youngster traveling with mama. After spotting the beautiful mammal cruising with a pod of four other dolphins, Rue and his guests Randy and Peyton Smith and Greg and Sam Elias of Monroe, LA idled nearby while watching and photographing the unusual sight for more than an hour.

More pictures on

www.calcasieucharters.com/index.cfm/MenuItemID/125.htm

37. Moon's blue light a coral aphrodisiac, say scientists

Ancient light-sensitive genes may be the trigger for the annual mass spawning of corals shortly after a full moon on the Great Barrier Reef, according to a study by Australian and Israeli scientists. The cryptochromes genes occur in corals, insects, fish and mammals - including humans - and are primitive light-sensing pigment mechanisms which predate the evolution of eyes. The Cry2 gene, stimulated by the faint blue light of the full moon, appears to play a central role in triggering the mass synchronised coral spawning, said the scientists in a paper published in the international journal *Science* on October 19. The scientists say this is the key to one of the central mysteries of coral reefs: how corals without eyes can detect moonlight and get the precise hour of the right couple of days each year to spawn. The annual mass spawning of corals occurs across a third of a million square kilometres of Australia's Great Barrier Reef, shortly after a full moon. Exposing corals to different colours and intensities of light and sampling live corals on reefs around the time of the full moon, Israeli researcher Oren Levy found the Cry2 gene at its most active in *Acropora* corals during full moon nights. The genes developed in primitive life forms in the

Precambrian, more than 500 million years ago, as a way of sensing light to synchronise their body clocks and breeding cycles, said the researchers. They are, in a sense, the functional forerunners of eyes, the researchers say. Cryptochromes still tune humans to the rhythms of the planet, but had lost their light-sensing function.

www.planetark.org/dailynewsstory.cfm/newsid/44916/newsDate/22-Oct-2007/story.htm
www.sciencemag.org/cgi/content/abstract/318/5849/467
<http://sciencenow.sciencemag.org/cgi/content/full/2007/1018/4>
www.sciencecentric.com/news/07101902.htm

38. Massive underwater forests found in Pacific

A team of scientists says it has found a string of vast, rich forests in an unexpected setting: far below the coral reefs found in the tropical Pacific Ocean. The new forests are made out of kelp plants that harbor a huge range of plants and animals. Like tropical rainforests, they may be refuges from threats posed by global climate change. For many, the case is a reminder of how little we know about what's underneath the ocean. The team of American scientists says it found a vast underwater forest in an unexpected location.

www.npr.org/templates/story/story.php?storyId=14738177
www.nytimes.com/2007/10/02/science/02kelp.html?_r=2&ref=science&oref=login&oref=slogin
www.pnas.org/cgi/content/abstract/104/42/16576

39. Australia: Rudd unveils Barrier Reef plan

An extensive plan to save Australia's Great Barrier Reef announced by Labor leader Kevin Rudd, who won the Australian general election on November 25, has brought environmental issues to the centre of the campaign stage. Defeated Prime Minister John Howard (Liberals) has been criticised within his own party for his lack of action on the environment and climate change. His refusal to sign the Kyoto Protocol is believed to be one factor in his increasing unpopularity among voters. Mr Rudd has accused the Howard government of failing to act on climate change, a view shared by many voters. He announced the A\$200m (£90m, US\$185.5m) plan while on a glass-bottomed boat tour of the reef in Queensland in the north-east of the country. The Great Barrier Reef, Australia's leading tourist destination, is being damaged by water pollution and rising sea temperatures, which are killing off the millions of coral that make up its 2300km (1429 mile) length. "The Great Barrier Reef is Australia's greatest natural asset," Mr Rudd said. The bulk of the fund, A\$146m (£65.4m), will go towards a water quality grants scheme to encourage landowners to adapt more environmentally-friendly agricultural practices. After his election victory Prime Minister Rudd announced also that he will make climate change his top priority, seeking advice on ratifying the Kyoto pact and telling Indonesia he will go to December's UN climate summit in Bali.

www.planetark.com/dailynewsstory.cfm/newsid/45036/newsDate/29-Oct-2007/story.htm
www.planetark.com/dailynewsstory.cfm/newsid/45522/newsDate/26-Nov-2007/story.htm

40. Ming the clam 'oldest animal'

A clam dredged up off the coast of Iceland is thought to have been the longest-lived animal discovered. Scientists said the mollusc, an ocean quahog clam, was aged between 405 and 410 years and could offer insights into the secrets of longevity. Researchers from Bangor University in north Wales said they calculated its age by counting rings on its shell. According to the Guinness Book of Records, the longest-lived animal was a clam found in 1982 aged 220. Unofficially, another clam - found in an Icelandic museum - was discovered to be 374-years-old, Bangor University said, making their clam at least 31 years older. The clam, nicknamed Ming after the Chinese dynasty in power when it was born, was in its infancy when Queen Elizabeth I was on the throne and Shakespeare was writing plays such as Othello and Hamlet. Ming died however shortly after his discovery was announced, according to the Dutch daily 'De Dag' from October 30.

<http://news.bbc.co.uk/2/hi/science/nature/7066389.stm>
www.welt.de/welt_print/article1311792/Das_aelteste_Tier_der_Welt_ist_410_Jahre_alt.html
(German)

41. Iran alarmed by mass dolphin deaths near Jask

The mysterious "mass suicide" of 152 dolphins washed up on Iran's coast during September and October has alarmed environmentalists, with the blame pointed at regional fishing practices, officials said on October 29. In September, 79 striped dolphins were found washed up near Jask port in southern Iran, and at the end of October another 73 were found dead in the same area. Pictures of rows of the corpses have been widely featured in Iranian newspapers, which said the dolphins had "committed suicide" - behaviour the animals have occasionally exhibited in the wild. "The suicide of dolphins on Jask's coast continues," Iran's state-run newspaper wrote on Saturday. "Locals tried to put the animals back in the water but they refused to return." Concern over the

deaths of these highly intelligent mammals prompted Iran's environmental protection authorities to show reporters the cut and bruised corpse of a dolphin to explain the "suicides". Concern over the deaths of these highly intelligent mammals prompted Iran's environmental protection authorities to show reporters the cut and bruised corpse of a dolphin to explain the "suicides". Mohammad Baqer Nabavi, deputy head of Iran's environmental protection organisation in charge of marine biology, said the most likely explanation was that the dolphins drowned after becoming entangled in fishing nets.



A dead dolphin is shown to the press in Tehran.



The dead dolphins on the beach near Jask.

<http://news.yahoo.com/s/afp/iranenvironmentpollutionfishing>
www.iol.co.za/index.php?set_id=1&click_id=31&art_id=vn20071030055914289C181419 (South African paper)
www.prestv.ir/detail.aspx?id=28802§ionid=3510208 (Iranian media)
<http://tursiops.org/modules.php?name=News&file=article&sid=4700> (Dolphin site)

42. Australian scientists decode whale sounds

Australian scientists studying humpback whales sounds say they have begun to decode the whale's mysterious communication system, identifying male pick-up lines and motherly warnings. Wops, thwops, grumbles and squeaks are part of the extensive whale repertoire recorded by scientists from the University of Queensland working on the Humpback Whale Acoustic Research Collaboration (HARC) project. Recording whale sounds over a three-year period, scientists discovered at least 34 different types of whale calls, with data published in the Journal of the Acoustical Society of America. The researchers studied migrating east humpback whales, as they travelled up and down Australia's east coast, and recorded 660 sounds from 61 different groups. Researchers attached audio transmitters to buoys near the whales and monitored the whale interaction from the shore. Many of the whale sounds could overlap in meaning, said Dunlop, but some had clear meanings.

www.planetark.org/dailynewsstory.cfm/newsid/45231/story.htm
<http://scitation.aip.org/journals/doc/ASALIB-home/jrnls/top.jsp?key=JASMAN>

43. Experts identify growth trigger for marine algae

Japanese scientists have identified two light receptors in marine algae which appear to be responsible for the proliferation of these plants. The scientists hope to use the findings, published in the Proceedings of the National Academy of Sciences, to control unwanted algal growth, such as red tides, or to cultivate coveted species of kelp that are used as food. In their experiment, the scientists removed the receptors genetically from a species of algae, called vaucheria, and found that the plant could no longer grow even though it was exposed to blue light for the next six months. Blue light is critical for the survival and growth of marine plants as light of other wavelengths cannot penetrate the thick water mass. It is unclear what causes red tides; some are seen as natural occurrences, while others are blamed on coastal water pollution. Toxic algal blooms can devastate marine plant and animal life.

www.planetark.org/dailynewsstory.cfm/newsid/45185/newsDate/7-Nov-2007/story.htm
www.pnas.org/

44. Court seeks new balance in US NAVY vs. Whales case

The US Navy can go ahead with training exercises this month using sonar off the California coast but should afterward implement new guidelines to protect whales, a US appeals court said on November 13. In August, the 9th Circuit in a split 2-1 decision put on hold a lower court injunction blocking the Navy sonar tests that wildlife supporters say harm whales. The Navy said its tests are vital to maintain military readiness. The dissenting judge in that case asked why the Navy had dropped environmental mitigation measures to protect whales it had used from mid-2006 to January 2007. A new order from a different three-judge panel also cited the need to revive such mitigation efforts and asked a lower court to reconsider the issue. It allowed the Navy to continue its exercises scheduled to end by Nov. 22nd, and then said a previous injunction should resume pending new rules to minimize damage to whales.

www.planetark.com/dailynewsstory.cfm/newsid/45331/newsDate/15-Nov-2007/story.htm (see CN 2007-5, item 20)

45. Fear for humpbacks as Japan whaling fleet sets sail

A Japanese whaling fleet left on November 18 for an expedition that activists say will for the first time target humpbacks, a perennial favourite among whale-watchers. A fleet of ships led by the 8,000-tonne Nisshin Maru left Shimonoseki port in southwestern Japan for the Antarctic Ocean around midday on an outing that operators say is for research purposes. Environmental activist group Greenpeace said the fleet's mission is to hunt whales for commercial purposes, adding that its Esperanza campaign ship was in waters off Japan, waiting to intercept the fleet in the coming days to demand its return home. The fleet aims to catch around 850 minke whales, which Japan says are now abundant enough to take, in addition to some 50 fin whales, which environmentalists say are endangered, and 50 humpbacks, which are favourites of whale-watchers for their distinctive silhouettes and acrobatic leaps from the water. The EU, US and Australia have called on Japan to stop the hunt. Japan insists that it has a right to maintain 'a cherished cultural tradition'.

www.planetark.com/dailynewsstory.cfm/newsid/45386/newsDate/19-Nov-2007/story.htm

www.planetark.com/dailynewsstory.cfm/newsid/45444/newsDate/21-Nov-2007/story.htm

www.planetark.com/dailynewsstory.cfm/newsid/45437/newsDate/21-Nov-2007/story.htm

www.planetark.com/dailynewsstory.cfm/newsid/45538/story.htm

46. Jellyfish attack wipes out N.Ireland salmon farm

Jellyfish wiped out Northern Ireland's only salmon farm, with more than 1 million pounds' (US\$2.06 million) worth of stock massacred in the attack. The jellyfish, covering an area of around 10 square miles (26 sq km), engulfed the Northern Salmon Company's cages off the province's northeastern coast, suffocating 100,000 fish, the firm's Managing Director, John Russell, stated on November 22. Staff on their way to give the fish their morning feed noticed a "reddish-brown tinge" to the sea and then realised the boats were struggling to make headway through an expanse of jellyfish up to 35 feet deep, Russell said. "A few hours later all our salmon were dead, the bulk of them suffocated." The attack, by a type of jellyfish known as a "mauve stinger", happened late last week off the coast of County Antrim, an area popular with tourists. The mauve stinger, noted for its purplish night-time glow, is more commonly found in warmer Mediterranean waters. Russell said the occurrence, when jellyfish "bloom" in such quantities, only happened every decade or so and last week's appearance off the Irish coast was also due to unusual environmental factors including higher-than-normal water temperatures. The salmon farm might not survive this 'salmocide'.

www.planetark.com/dailynewsstory.cfm/newsid/45509/story.htm

The Scottish coast has also been put on jellyfish alert, see

www.planetark.com/dailynewsstory.cfm/newsid/45516/newsDate/26-Nov-2007/story.htm

47. Cappuccino Coast: The day the Pacific was whipped up into an ocean of froth

It was as if someone had poured tons of coffee and milk into the ocean, then switched on a giant blender. Suddenly the shoreline north of Sydney were transformed into the Cappuccino Coast. Foam swallowed an entire beach and half the nearby buildings, including the local lifeguards' centre, in a freak display of nature at Yamba in New South Wales. One minute a group of teenage surfers were waiting to catch a wave, the next they were swallowed up in a giant bubble bath. The foam was so light that they could puff it out of their hands and watch it float away. See

www.dailymail.co.uk/pages/live/articles/news/worldnews.html?in_article_id=478041&in_page_id=1811

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– AQUACULTURE AND FISHERIES –

48. EU plans more paperwork to wipe out illegal fishing

European Union regulators plan to clamp down on pirate fishermen who trawl illegally in EU waters by demanding more paperwork and threatening to shut ports for landing catches, the EU's fisheries chief said on September 27. The phenomenon known as illegal, unreported and unregulated fishing (IUU) is nothing new, either in EU waters or elsewhere, but in recent years it has come back into the spotlight, as depleted fish stocks demand ever stricter control measures. EU fishermen were equally guilty, EU Fisheries Commissioner Joe Borg said, adding that a priority was to change rules so that non-EU vessels could be prevented from landing catches at EU ports if they were quota-busting or catching undersized fish.

www.planetark.com/dailynewsstory.cfm/newsid/44574/story.htm

In a draft directive published on October 17, EU Fisheries Commissioner Joe Borg said non-EU vessels should be prevented from landing catches at EU ports if they were quota-busting, catching undersized fish or using banned fishing methods. The draft directive calls for a scheme where the import of all fisheries products, including processed, would require certification by the country whose flag the vessel is flying to prove the fish had been legally caught. If vessels broke the rules, they might find EU ports closed to them. The draft directive must be debated by EU-27 fisheries ministers before it can enter into force. It would seek maximum financial penalties for serious breaches and require EU governments to impose stricter controls on any of their nationals carrying out IUU fishing outside EU waters. A lot of IUU fishing is done by vessels flying so-called flags of convenience where scrutiny by local authorities can often be minimised, officials say. To tackle this problem, the draft EU law would "blacklist" countries used as hosts for such flags and any vessels that carried out IUU fishing. Both could face EU trade restrictions. Blacklisting would also affect vessels registered under the flag of a country that had been deemed suspect, Borg said.

www.planetark.com/dailynewsstory.cfm/newsid/44877/newsDate/18-Oct-2007/story.htm

49. New EU fish law means China must step up oversight

European Union efforts to crack down on illegal fishing mean that major fish processing countries such as China must strengthen certification to prove the sources of their products are legally caught, the EU said on November 9. Cod and other protected fish have ended up in China and other countries for processing, hindering efforts to make fisheries more sustainable and creating unfair competition for legal fishing vessels, said Joe Borg, European Commissioner for Fisheries and Maritime Affairs. Borg was speaking in Beijing, where he met with officials from the Agriculture Ministry, the State Oceanic Administration and the Foreign Ministry for talks aimed at strengthening cooperation on managing fisheries and fighting pirate fishing. He said he also explained a new EU draft law that cracks down on illegal fishing in European waters with stiff fines and the blacklisting of boats and countries. The law calls for a scheme in which the import of all fish and fisheries products into the EU would require certification to prove the catch has been legally caught. If vessels break the rules, they may find EU ports closed to them.

www.planetark.com/dailynewsstory.cfm/newsid/45278/newsDate/12-Nov-2007/story.htm

50. Sushi craze threatens Mediterranean's giant tuna

Fishermen like Diego Crespo have trapped the giant tuna swarming into the warm Mediterranean for over 3,000 years, but he says this year may be one of his last. Japanese demand for its fatty flesh to make sushi has sparked a fishing frenzy for the Atlantic bluefin tuna - a torpedo-shaped brute weighing up to half a tonne that can accelerate faster than a Porsche 911. Now a system of corralling the fish into 'tuna ranches' has combined with a growing tuna fishing fleet to bring stocks dangerously close to collapse, warn scientists from ICCAT - the body established by bluefin fishing countries to monitor the stock.

www.planetark.com/dailynewsstory.cfm/newsid/44605/newsDate/2-Oct-2007/story.htm

<http://news.bbc.co.uk/2/hi/science/nature/7040011.stm>

The WWF published a further alarming report on the condition of tuna worldwide on November 20, see

www.planetark.com/dailynewsstory.cfm/newsid/45446/newsDate/21-Nov-2007/story.htm

www.panda.org/news_facts/newsroom/index.cfm?uNewsID=117600

51. Tuna fishing kills endangered birds, sea life

Fishhooks meant to catch tuna in the southern Pacific and Indian Oceans are killing endangered seabirds, as well as sharks and turtles, WWF said on October 11. It estimated up to 13,500 seabirds, including 10,000 albatrosses, were caught every year by long-line fisheries targeting southern bluefin tuna. Most of the fishing vessels were from Japan.

Long-line fishing involves trailing a single line with hundreds or thousands of hooks. WWF said 19 of the 22 species of albatross were classified as threatened with extinction by the World Conservation Union. WWF said the Commission for the Conservation of Southern Bluefin Tuna should take tougher action at an annual meeting in Australia in week 42 to stem over-fishing and protect other wildlife such as sharks, turtles and seabirds.

www.planetark.com/dailynewsstory.cfm/newsid/44798/story.htm

www.panda.org/news_facts/newsroom/index.cfm?uNewsID=114860

52. USA calls for ban on Mediterranean tuna fishing

The United States said on October 17 it would demand a complete ban on fishing the bluefin tuna for up to five years in and near the Mediterranean, to allow stocks to recover. William Hogarth, Director of the US fisheries service, NOAA, said in a statement he would ask the autumn meeting of the International Commission for the Conservation of Atlantic Tuna (ICCAT) to implement a moratorium over the fishery for three to five years. Although thousands of miles from its own fisheries, NOAA said it sought the Mediterranean ban because the eastern stock mixed with its own, much smaller population, when not spawning between April and July. "There is real concern about the impact of uncontrolled eastern bluefin catches on western Atlantic bluefin tuna caught by our fishermen," Hogarth said.

www.planetark.com/dailynewsstory.cfm/newsid/44874/newsDate/18-Oct-2007/story.htm

www.nmfs.noaa.gov/features/billscorner/index.htm

53. South African cabinet bans abalone fishing – in principle

South Africa's cabinet has approved an indefinite ban on commercial abalone fishing to guard against poaching of the shellfish, which is increasingly popular in Asia. The government has drastically reduced the total allowable abalone catch in the wild and attempted to encourage saltwater farming of the curlicue-shaped shellfish. Shipped to Asia as a seafood delicacy, abalone has become a prized commodity for South African entrepreneurs as well as criminals who have poached the mollusc close to extinction. Abalone is a status symbol in Asia and a reputed aphrodisiac. It has spurred sophisticated smuggling rings, some linked to China's Triad gangs, according to South Africa's Institute of Security Studies.

www.planetark.com/dailynewsstory.cfm/newsid/45013/story.htm

However, on October 31 South Africa postponed the indefinite ban on commercial abalone fishing. The cabinet's move last week prompted the powerful COSATU trade union to join with fishermen to lodge an urgent court case to overturn the ban. "I have decided to delay the implementation of the decision to February 1, 2008," South Africa's environmental affairs minister Marthinus van Schalkwyk told a media briefing. The government has drastically reduced the total allowable abalone catch in the wild and attempted to encourage saltwater farming of the shellfish. COSATU said in a statement it welcomed the decision and was committed to working with the government on the issue. However, the South African Abalone Industry Association, which represents the commercial abalone fishing industry, will press ahead with court action to overturn the ban.

www.planetark.com/dailynewsstory.cfm/newsid/45098/newsDate/1-Nov-2007/story.htm

54. Parrotfish on menu puts Caribbean coral at risk

The delicate balance of the Caribbean's coral reefs is in jeopardy as more parrotfish end up on dinner plates, international scientists said on October 31. The colourful grazing fish, named for their parrot-like beaks which are used to scrape up algae, play a vital role in stopping seaweed from smothering coral. But their numbers are now being threatened by over-fishing.

New research based on computer modelling shows parrotfish are a key defence in preventing the vulnerable Caribbean reefs from becoming a very different ecosystem - one dominated not by living coral but by blooms of algae or seaweed. Coral reefs around the world are under threat from climate change, due to warming seas and increased ocean acidity, but the problem is particularly acute in the Caribbean following a series of disasters in the 1980s and 1990s. The result, according to projections published in the journal *Nature* by Peter Mumby, a marine biologist from Exeter University and colleagues at the University of California, is that coral reefs could be damaged beyond repair unless management of the marine environment is changed urgently. Top of the list should be controls over the use of fish traps - devices similar to lobster pots that are used to catch most parrotfish. Although not renowned for their flavour, parrotfish have become increasingly popular in restaurants around the Caribbean following over-exploitation of more prized fish species such as grouper and snapper.

www.planetark.com/dailynewsstory.cfm/newsid/45099/newsDate/1-Nov-2007/story.htm

<http://news.bbc.co.uk/2/hi/science/nature/7069933.stm>

55. Fish vanishing from Southeast Asian oceans

Southeast Asia's oceans are fast running out of fish, putting the livelihoods of up to 100 million people at risk and increasing the need for governments to support the maintenance of fish stocks, an Australian expert said. Fisheries in the region had expanded dramatically in recent decades and Indonesia, Thailand, Vietnam and the Philippines were now in the top 12 fish producing countries in the world, Meryl Williams said in a paper for Australia's Lowy Institute. In the Gulf of Thailand, the density of fish had declined by 86 percent from 1961 to 1991, while between 1966 and 1994 the catch per hour in the Gulf by trawlers fell more than sevenfold. In Vietnam, a new fishing power and a rising source of imports by Australia, the total catch between 1981 and 1999 only doubled despite a tripling of capacity of the fishing fleet - a sure sign that fishing was reaching capacity, she said. In the Gulf of Tonkin, where Vietnam shares resources with China, the record was even worse with fish catch per hour in 1997 only a quarter of that in 1985. Williams said Southeast Asian fisheries were serviced by a plethora of regional bodies and agreements, but few acted effectively on illegal fishing and shared stock management. At the same time, illegal fishing was "dynamic, creative, clever and usually one step ahead of authorities". Williams said Australia should step up collaboration with Southeast Asian countries to help manage fish stocks.

www.planetark.org/dailynewsstory.cfm/newsid/45201/newsDate/8-Nov-2007/story.htm
www.lowyinstitute.org/

56. Evolution impact key to save fish stocks – scientists

Industrial-scale fisheries have not only sapped the world's fish stocks but also changed the species' evolutionary course, exacerbating the effect of overfishing by producing smaller and less fertile fish. Scientist Ulf Dieckmann also said that overfishing and the practice of throwing lower quality fish back into the sea to raise the value of fishing quotas might explain the massive drop in population. Some 15 years ago, cod stocks in the Canadian Grand Banks in the north-west Atlantic collapsed, bringing down the fishing industry in the region. The same species is now under threat in the north-east Atlantic off Norway and Russia, he said. In the Canadian Grand Banks fish stocks still show little sign of recovery, Dieckmann said, adding that evidence suggested humans were also responsible for this. Looking at fishery data from the past few decades, the scientists found that increased mortality due to overfishing had favoured fish that matured smaller and earlier, yet also carried far fewer eggs at their first reproduction. Older data showed that a typical cod caught in Norway might have taken ten years to mature, while the same fish now would only take six years or even less, said Dieckmann. Dieckmann expected that a change coming about in 40 years might take up to 250 years to reverse - if it happened at all. The result of the international research project to which thirteen institutes contributed have been published in the journal *Science*.

www.planetark.com/dailynewsstory.cfm/newsid/45496/story.htm
www.iiasa.ac.at/~dieckman/ (C.V. Ulf Dieckmann)
www.iiasa.ac.at/cgi-bin/iferfinger?login:%5Edieckman%24:15:383
www.sciencemag.org/cgi/content/short/318/5854/1247 (article not free)

57. WW2 bombs may hold key to contaminated Baltic fish

Some fish in the Baltic Sea may have been contaminated by World War Two explosives containing arsenic, German researcher Hermann Kruse, whose team is investigating whether the fish are dangerous for consumption, said November 22. Kiel University researchers said they have found arsenic levels 10 times higher than normal in the fish found off the northern coast of Germany near Kiel. Low levels of arsenic naturally occur in the sea, he said. Researchers found 50 milligrams of arsenic per kilogram of fish, higher than the usual 5 milligrams occurring naturally. Marine experts estimate there are hundreds of thousands of tonnes of explosives left over from World War Two lying at the bottom of the North and Baltic Seas.

www.planetark.com/dailynewsstory.cfm/newsid/45497/story.htm
www.uni-kiel.de/toxikologie/mitarbeiter/hk.html (contact information Kruse)

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- PUBLICATIONS AND WEBSITES -

58. EUROSION Final Report published in Italian

The EUROSION project Final Report is now officially published in the Italian language. This publication has been funded by the Regional Authority of Tuscany and the INTERREG IIIC Project Beachmed-e, in cooperation with EUCC – The Coastal Union. Earlier, EUCC prepared versions in English, French, Spanish and Portuguese.

The various language versions can be downloaded from <http://www.euroSION.org/>

Commissione Europea. Vivere con l'erosione costiera in europa - Sedimenti e Spazio per la Sostenibilità. Lussemburgo: Ufficio per le Pubblicazioni Ufficiali delle Comunità Europee 2007 - 40 pp - 21 x 29,7 cm. ISBN 978-92-79-06194-3

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– EVENTS AND TRAINING, 1ST ANNOUNCEMENTS –

This list only includes the 1st Announcements of conferences and training courses. For a complete overview of conferences please visit: <http://www.coastalguide.org/meetings>

March 31 - April 3, 2008. Liverpool, UK

International Dune Conference - Changing Perspectives in Coastal Dune Management

Organised by Liverpool Hope University, for more information and participation, see

www.hope.ac.uk/coast/

July 2 – 5, 2008. Faculty of Engineering of the Technical University of Bari, Italy

COASTLAB08 2nd International Conference on the Application of Physical Modelling to Port and Coastal Protection 2008,

All abstracts should be emailed as one word-file attachment to damiani@coastlab08.com or send abstracts via web upload. Deadline for receipt of abstracts is December 31, 2007.

Registration forms and fees, as well as other relevant information on the conference are available on the conference web site www.coastlab08.com

Oct. 20-24, 2008: Toulon – Marseille, France

BIOMARINE: Towards an international Sea Policy: Inspiration from the European Model. Conference in the framework of the French EU Presidency.

www.biomarine.org

Nov. 26-28, 2008 (provisional dates): Venice, Italy

LITTORAL 2008, the main European coastal conference of 2008, organised by CORILA for EUCC - The Coastal Union and EUROCOAST.

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– COLOPHON –

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Established in 1989, EUCC - The Coastal Union is an association involving the largest coastal network in Europe with 2750 members and member organisations in 40 countries. For more information please contact EUCC International Secretariat, POBox 11232, NL-2301 EE Leiden, the Netherlands

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This publication is supported by the European Union

