US-Soviet collaboration on stratospheric ozone depletion

Washington

DECLARING that there is "special value" in cooperation on global problems related to stratospheric ozone depletion, the US-USSR Joint Committee on environmental protection announced a scientific meeting on that topic to take place shortly in Moscow. Ozone investigations form one of 38 new scientific and technical projects adopted by the two countries during a meeting in Washington last month.

The Soviet Union has an extensive network of ground stations for measuring ozone, but the Soviet measurements are not made with the Dobson spectrophotometer which is standard in the West. One goal of the Moscow meeting will be to develop calibration protocols so that data can be compared. The United States will also be supplying Soviet scientists with ozonesondes for vertical ozone measurements at Soviet Antarctic stations.

In the summer, East German and US ozonesondes will be tested together in Rylsk, outside Moscow. In a related effort, the National Oceanographic and Atmospheric Administration (NOAA) will be sending a chlorofluorocarbon monitoring instrument to Estonia in the next few weeks. John Miller, deputy director of NOAA's air resources laboratory, says US scientists will have access to all data collected in Estonia. As well as the ozone studies, the joint committee also approved studies of greenhouse gases and

their effect on climate. Following a meeting in Leningrad last July, the committee concluded that human influences probably caused the 0.5 °C rise in temperature of the Northern Hemisphere observed over the past 100 years. Further changes in the balance of atmospheric gases could have a significant effect on agriculture and the coastal environment.

In late spring, a Soviet delegation will visit the United States to discuss air pollution monitoring and modelling. At about the same time, another Soviet delegation will arrive to discuss stationary sources of pollution, and a US group may visit the Soviet Union to hold talks on mobile sources of pollution.

The joint committee on cooperation in environmental protection came into being as a result of a bilateral agreement signed in 1972, and is renewable every five years. Although it came as no surprise, the two countries agreed to another five-year extension beginning in May. At present, relations are particularly cordial on environmental issues, with the Soviet Union particularly keen.

The Soviet Union has also recently announced plans to rejoin the Ocean Drilling Project, which brings to eight the number of fully fledged participants. The European Science Foundation joined last spring (see *Nature* 321, 102; 1986). An official signing ceremony is planned for Moscow later this winter. **Joseph Palca**

Pentagon move slows space station progress

Washington

THE US Department of Defense has thrown a potentially damaging wrench into the delicate machinery of international cooperation on the space station. At the Pentagon's bidding, NASA (National Aeronautics and Space Administration) has postponed a scheduled January meeting in Paris with the European Space Agency (ESA) until an interagency group can meet to determine what part the Defense Department will play in the international project.

The Pentagon asked for the delay during December. An interagency group, chaired by the Department of State, has already held one meeting to discuss the Defense Department's interest and to see how it will alter the US negotiating position. The working group will report to Air Force Colonel Gerald May, director of space for the National Security Council.

The Pentagon's interest in the space station appears to have blown up suddenly. During the past year, there has not been a strong interagency policy on the space station. But once the Pentagon indicated its concern, other agencies chimed in with other problems, although defence issues will probably dominate the working group's agenda.

Pentagon spokesman Lt Col. Donald Brownlee says no particular uses for the space station have been established. Brownlee says the department is merely making sure that its options are not foreclosed. After study, Brownlee contends, the space station may turn out to be ideal for conducting experiment for the Strategic Defense Initiative (SDI). There are no plans to use the space station as an operational base.

NASA has never concealed the possibility of the Defense Department becoming a user of the space station, but has never emphasized it. The level of military participation could cause problems for ESA and Japan. Ian Pryke, ESA's Washington representative, says the ESA covenant allows the agency to participate only in projects with peaceful purposes. ESA is already embroiled in difficult negotiations with NASA over its financial contributions to the space station (see *Nature* 324, 505; 1986). Depending on what role the Pentagon wants to play, the debate within ESA may shift to the interpretation of the term 'peaceful purposes'.

Japan has always regarded the space station as being reserved for peaceful activities. A heavy military component in the project could pose problems for Japan's continued participation. **Joseph Palca**

THE south side of Lake Nyos, Cameroon, where on 21 August 1986 a huge volume of toxic gas was released from beneath the lake, producing an aerosol of water mixed with gas that swept down the valleys to the north of the lake killing more than 1,700 people. This picture was taken by Dr S.J. Freeth on 8 September 1986. Wave damage to the vegetation, particularly on the delta to the south of the lake and over the promontory to the west, is clearly visible. Drs Freeth and R.L.F. Kay, who were in the UK team that investigated the disaster, report their conclusions in a *News and Views* article in next week's *Nature*. □