

POPULATION

World Starvation Eased

➤ ONE OF the major worries of the world, whether the earth will become so filled with people much of humanity will starve to death, is taking care of itself, facts presented at the American Association for the Advancement of Science meeting in Berkeley, Calif., seem to indicate.

As civilizations became more industrialized in the Western countries, their birth rates declined, so much so that there was a race suicide scare.

Simultaneously, better health and increased food gave the so-called underdeveloped countries a population spurt, thus creating a fear that the people in the least-developed countries might take over the world.

This unequal population growth "unleashed by the splendid success of our civilization in preserving human life" will continue in all major regions through 1980, but Dr. Dudley Kirk of the Population Council, New York, reported that Asia and Latin America may be expected eventually to slow their momentum of population growth.

The choice between balance of births and deaths and periodic population reduction through famine, epidemics and war will

be made in the next two or three generations by action of individuals and not by governmental policies.

Both Soviet Russia and Japan have checked birth rates that were causing concern to other nations. The present Soviet birth rate of 24 per 1,000 population, slightly less than in the United States, is a drop from the prewar figure of 38 per thousand.

The Japanese rate is 21.5, below that of the United States and rapidly approaching European levels.

Atomic war might wipe out enough people to influence population, but Dr. Kirk pointed out that only about five percent of world population lives in the 60 cities of more than 1,000,000 population that would be prime atomic targets.

The destruction of all our major cities would not directly destroy a large part of the human race, he said.

In considering human survival, Dr. Kirk computes that four or five normal years of world population growth would completely replace numerically the United States population, and six years would replace that of the Soviet Union.

Science News Letter, January 8, 1955

EDUCATION

Urge "Genius Specialists"

➤ AMERICAN SCHOOL systems should recruit outstanding teachers to be specialists with superior students, especially those talented in science and mathematics, Dr. Garford G. Gordon of the California Teachers Association urged at the American Association for the Advancement of Science meeting in Berkeley, Calif.

When such properly trained and equipped "genius specialists" are available, they should be given the backing of the school administration.

The specialist teacher should, however, be allowed a free hand in dealing with her geniuses, whether by "needling" them to use their talents to a fuller extent or by giving the superior students a free hand to follow their own hunches.

A survey of what American high schools are doing to encourage superior science and mathematics students, and so help to relieve the national shortage of technological manpower, and a study of Science Talent Search results, convinced Dr. Gordon that the schools are not doing badly.

Some schools, however, are not doing what they could. Community pressure, Dr. Gordon pointed out, is often put on the schools to take special care of slow students and juvenile delinquents. In such a situation, school administrators must neglect the brilliant unless they happen to be brilliantly delinquent.

More money must be spent to provide for

the schooling of superior science and mathematics students, Dr. Gordon concludes. But more than for money, the need is for smaller classes, lighter teacher loads, more freedom from administrative restrictions on teachers of superior students, more time for teachers and students, and better prepared teachers.

A recent California Teachers Association study found that the percentage of high school classes taught by inadequately trained teachers was higher for mathematics than for any other academic subject.

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ASTRONOMY

Spot New Object In Southern Sky

➤ AN OBJECT moving at about the rate of an asteroid, but not definitely identified as such, has been discovered in the constellation of Taurus, the bull, which is visible high in the southern sky.

The object's magnitude is 16, too faint to be seen without a very large telescope. It was spotted on Dec. 18, 1954, by Guillermo Haro and Enrique Chavira of the Observatorio Astrofisico Nacional, Tonantzintla, Puebla, Mexico. News of its discovery was sent to observatories by Harvard College Observatory.

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• RADIO

Saturday, Jan. 15, 1955, 5:00-5:15 p.m. EST
"Adventures in Science," with Watson Davis, director of Science Service, over the CBS Radio Network. Check your local CBS station.

Dr. John B. Schmitt, associate professor of entomology, Rutgers, State University of New Jersey at New Brunswick, will discuss "Termites."

PUBLIC HEALTH

Wild Rodents Cleared Of Valley Fever Blame

➤ CONTRARY TO previous belief, wild rodents are not an important reservoir for organisms that cause valley fever, or coccidioidomycosis, a respiratory disease found in the Southwest.

This was concluded by Dr. Orda Plunkett, Robert Lubarsky and Frank Swatek of the department of botany at the University of California at Los Angeles from a study of more than 1,100 wild rats, mice and rabbits trapped in various southern California areas.

Only eight of the animals, 0.7 of one percent, yielded evidence of infection with the valley fever organism.

With such a small percentage of the large collection showing evidence of infection, the investigators concluded that these rodents are not a dangerous source of infection.

The eight animals were probably accidentally infected from soils containing the organism, the researchers believe.

The infected group consisted of pocket mice, kangaroo rats and one jack rabbit. This is the first time the rabbit has been found to be susceptible to the disease.

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MARINE BIOLOGY

Shrimp-Like Animals Live Beneath Arctic Ice

➤ WHILE MAN tries to find a way to live on the surface of the barren sea-ice covering much of the central Arctic Ocean, two species of shrimp-like animals manage very well living just beneath the ice.

The survival habits of marine organisms known as amphipods were reported by Dr. J. Laurens Barnard of the Arctic Aeromedical Laboratory and University of Southern California at the American Association for the Advancement of Science meeting in Berkeley, Calif.

During the wintertime, Dr. Barnard reported, these amphipods are found in great numbers near the surface of the ocean in a layer less than 30 feet deep, below the seven-foot-thick ice layer that year-round covers this area near the North Pole.

One of the two species, *Gammarus wilkitzkii*, the scientist stated, has made an interesting adjustment to this environment. Normally, amphipods live only on the ocean bottom in depths up to 300 feet. This one, however, stays alive by clinging to the undersurface of the ice itself.

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