
Fate of uranium from bombed reactor unknown

SPECIALISTS on nuclear proliferation are worrying about the whereabouts of 22 kilograms of highly enriched uranium that was stored at Iraq's Tuwaitha Nuclear Research Centre, about 50 kilometres south of Baghdad. The US announced last week that it had bombed the centre, and said it had "thoroughly damaged" a 5-megawatt research reactor there.

One government official said that the uranium should still be intact and buried in the rubble. It would only be "missing", said the official, if it were deliberately removed.

The uranium is covered by international safeguards intended to ensure that nuclear material is used only for peaceful purposes. The International Atomic Energy Agency last inspected the uranium fuel in November. Just over half the uranium is in the form of uranium metal, enriched to weapons grade.

The remainder is uranium oxide that is only 80 per cent enriched.

The fuel is only mildly radioactive until it is used as fuel in a reactor, so there would be little environmental damage from bombing stored uranium. Destroying an operating reactor, on the other hand, could contaminate the entire site with radioactive debris. "It would be a very nasty cleanup," says David Fischer, who was formerly in charge of safeguards at the International Atomic Energy Agency.

Bombing a reactor that is covered by the IAEA's safeguards is also politically significant, said Fischer. It amounts to "a vote of no confidence in international safeguards", and is the first instance of a nation that has signed the Nuclear Non-proliferation Treaty bombing a nuclear reactor.

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