

obligation with the jamming of GPS signals in an urban area. Furthermore jamming of GPS signals is not necessarily effective against cruise missiles, which are equipped with DETD technology¹¹⁴.

III 3.5 Perfidy and Ruses of War

It is important to note that an attack on satellite signals that would alter the content of the communication must not mislead the enemy as to his legal status, as this could be considered an act of perfidy. Perfidy is the hostile use of a belligerent's obligation to respect LOAC in order to kill, wound or capture him¹¹⁵. An act of perfidy must not be confused with a legitimate ruse of war.

III 3.6 New Weapons

The development of ASAT weapons presupposes much research, development and testing. API Art 36 imposes certain rules pertaining to the development of new weapons. In the development of new weapons a state determines whether their employment would, in some or all circumstances, be prohibited by the Protocol or by any other rule of international law. Thus the testing of weapons in space causes an interesting problem. There are two perspectives on the legitimacy of testing weapons, which would result in the closure of large areas of the ocean¹¹⁶. Some argue that such tests are an exercise in freedom of the seas; others argue that it is a denial of the freedom. This debate can easily be transported to outer space. Brownlie argues that this is a debate of reasonableness and mutuality¹¹⁷ and that these principles apply in times of war as well as in times of peace¹¹⁸. In any case the principle of "due regard" applies in outer space. Article IX of the OST edicts that "State Parties...shall conduct their activities...with due regard to the corresponding interests of all other State Parties to the Treaty". This would apply to the conduct of hostilities in outer space. Furthermore nuclear weapon testing in space has been banned¹¹⁹ which would apply to the testing of nuclear ASAT technologies.

III 3.7 Low Tech ASAT Weapons

Attempts to neutralize the use of satellites do not necessarily presuppose high tech weaponry. During the Gulf War an estimated 600 Kuwaiti oil wells were set on fire¹²⁰. The result was a covering of black smoke over a large territory. During the present American led military operation in Iraq, there have been reports of fires in and around Baghdad, probably in an attempt to cause a smoke screen over the Iraqi capital. Visual and electro-optical devices, optical imaging satellites cannot function through dense clouds of smoke. Radar imaging satellites can however see through clouds of smoke¹²¹. Although such tactics may perhaps have some utility against certain imaging satellites they are ineffective against GPS guided munitions.

¹¹⁴ "Precise DTED of target areas can be uploaded to cruise missiles and correlated with an on-board altimeter for highly accurate all-weather mid-course and terminal guidance, which is autonomous and thereby resistant to both GPS jamming and covert techniques» Department of Defense Space Technology Guide FY 2000-01, available at <http://fas.org/spp/military/myer.pdf> p. 56.

¹¹⁵ Hague IV, supra, note 11, art 36, API, supra, note 11 art 37.

¹¹⁶ I. Brownlie Principles of Public International Law. (Oxford, Oxford University Press) at 239

¹¹⁷ IBID.

¹¹⁸ IBID p. 240.

¹¹⁹ *Treaty Banning Nuclear Weapons Tests in the Atmosphere, in Outer Space and Under Water*, Aug, 5 1963, 14 U.N.T.S. 43, 2 I.L.M. 889; See also various UNGA declarations on the use of nuclear weapons: *Declaration on the Prohibition of the Use of Nuclear and Thermo-Nuclear Weapons*, U.N.G.A. Res. 1653, U.N. GAOR, Supp. No. 17 at 4, U.N. Doc. A/5100 (1961); *Resolution on the Non-Use of Force in International Relations and Permanent Prohibition of the Use of Nuclear Weapons*, U.N.G.A. res. 2936, U.N. GAOR, Supp. No. 30, at 5 U.N. Doc A/8730 (1972); *Resolution on the Non-Use of Nuclear Weapons and Prevention of Nuclear War*, UNGA Res. 35/152D, U.N. GAOR, Supp. No. 48, at 69, U.N. Doc.A/35/48 (1980).

¹²⁰ UNSC Resolution 687 dated April 3 1991 affirmed that Iraq was liable for environmental damage and depletion of natural resources. See <http://www.un.org/Docs/scres/1991/scres91.htm>.

¹²¹ According to the Gulf War Report it is not clear why the oil wells were set ablaze by Iraq as these fires were created with the maximum of damage to the oil wells themselves. As the Gulf War Report points out, "Had the purpose of the fires been to create an obscurant, oil wells in that field on each side of the border undoubtedly would have been set ablaze; Iraqi destruction was limited to the oil wells on the Kuwaiti side only, supra, note 20, at 637.