Convention on Prohibitions or Restrictions on the Use of Certain Conventional Weapons Which May Be Deemed to Be Excessively Injurious or to Have Indiscriminate Effects

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Group of Governmental Experts on Emerging Technologies in the Area of Lethal Autonomous Weapons System

Geneva, 7-11 March, and 25-29 July 2022 Item 7 of the agenda **Adoption of the report (last session only)**

Report of the 2022 session of the Group of Governmental Experts on Emerging Technologies in the Area of Lethal Autonomous Weapons Systems

I. Introduction

1. The Sixth Review Conference of the High Contracting Parties to the Convention on Prohibitions or Restrictions on the Use of Certain Conventional Weapons Which May Be Deemed to Be Excessively Injurious or Have Indiscriminate Effects (hereinafter "the Convention"), held in Geneva from 13 to 17 December 2021, decided, as contained in its final document (CCW/CONF.VI/11):

"(...) that the work of the open-ended Group of Governmental Experts related to emerging technologies in the area of lethal autonomous weapon systems established by Decision 1 of the Fifth Review Conference as contained in document CCW/CONF.V/10, adhering to the agreed recommendations contained in document CCW/CONF.V/2, is to continue, to strengthen the Convention.

In the context of the objectives and purpose of the Convention, the Group is to consider proposals and elaborate, by consensus, possible measures, including taking into account the example of existing protocols within the Convention, and other options related to the normative and operational framework on emerging technologies in the area of lethal autonomous weapon systems, building upon the recommendations and conclusions of the Group of Governmental Experts related to emerging technologies in the area of lethal autonomous weapon systems, and bringing in expertise on legal, military, and technological aspects.

International law, in particular the United Nations Charter and international humanitarian law, as well as relevant ethical perspectives should guide the continued work of the Group.

The rules of procedure of the Review Conference shall apply *mutatis mutandis* to the Group.

The Group shall conduct its work and adopt its report by consensus and shall submit a report to the meeting of High Contracting Parties. The widest possible participation of all High Contracting Parties is to be promoted in accordance with the goals of the CCW Sponsorship Program.

The Group shall meet for 10 days in Geneva in 2022.

The GGE Chair will be designated by consensus through a written silence procedure.".

2. The Sixth Review Conference of the High Contracting Parties to the Convention also decided, as contained in its final document (CCW/CONF.VI/11):

"To organize in 2022, in in-person format in accordance with the regular practice under CCW, in accordance with the relevant decisions taken by the Twenty-third Annual Conference of the High Contracting Parties to Amended Protocol II and the Fifteenth Conference of the High Contracting Parties to Protocol V, and subject to available resources, the following CCW related activities:

(...)

 (iii) Group of Governmental Experts of the High Contracting Parties related to emerging technologies in the area of lethal autonomous weapons systems (LAWS) on 7-11 March 2022, and 25-29 July and adopted its estimated costs (CCW/CONF.VI/7);"

3. On 11 February 2022, the High Contracting Parties designated, through a written silence procedure, Ambassador Flávio Soares Damico, Special Representative of Brazil to the Conference on Disarmament, as Chairperson of the 2022 Group of Governmental Experts of the High Contracting Parties related to emerging technologies in the area of lethal autonomous weapons systems (LAWS) (hereinafter "the Group").

II. Organization and work of the Group of Governmental Experts

4. The Group met from 7 to 11 March, and from 25 to 29 July 2022 in Geneva. The Chair also organized three sets of virtual informal meetings on 26-27 April, 1 and 3 June, and 27 and 29 June 2022.

5. The Group adopted its agenda (CCW/GGE.1/2022/1) and agreed on its programme of work (CCW/GGE.1/2022/2). Ms. Heegyun Jung, Political Affairs Officer, CCW Implementation Support Unit, served as the Secretary of the Group, and was assisted by Ms. Juliana Helou van der Berg and Ms. Sophie Guillermin-Golet, Associate Political Affairs Officers of the United Nations Office for Disarmament Affairs (UNODA).

6. The following High Contracting Parties to the Convention participated in the work of the Group: [...]

7. The following Signatory States to the Convention participated in the work of the Group: [...]

8. The following States not party to the Convention participated as observers: [...]

9. The representatives of the European Union, the International Committee of the Red Cross (ICRC) and the United Nations Institute for Disarmament Research (UNIDIR) participated in the work of the Group in accordance with the rules of procedure.

10. The representatives of the following non-governmental organizations participated in the work of the Group: [...]

11. The representatives of the following entities also participated in the work of the Group: [...]

12. In accordance with its Programme of work, the Group considered the following agenda item:

5. Consideration of proposals and elaboration, by consensus, of possible measures, including taking into account the example of existing protocols within the Convention, and other options related to the normative and operational framework on emerging technologies in the area of lethal autonomous weapon systems, building upon the recommendations and conclusions of the Group of Governmental

Experts related to emerging technologies in the area of lethal autonomous weapon systems, and bringing in expertise on legal, military, and technological aspects.

13. The following documents from High Contracting Parties were circulated to the Group:

- a. GGE Document on the Application of International Humanitarian Law to Emerging Technologies in the Area of Lethal Autonomous Weapon Systems (LAWS); submitted by the United Kingdom
- b. Principles and Good Practices on Emerging Technologies in the Area of Lethal Autonomous Weapons Systems; submitted by Australia, Canada, Japan, the Republic of Korea, the United Kingdom, and the United States
- c. Roadmap Towards a New Protocol on Autonomous Weapons Systems; submitted by Argentina, Costa Rica, Guatemala, Kazakhstan, Nigeria, Panama, Philippines, Sierra Leone, State of Palestine, Uruguay
- d. Working paper; submitted by Argentina, Austria, Belgium, Chile, Costa Rica, Ecuador, Guatemala, Ireland, Kazakhstan, Liechtenstein, Luxembourg, Malta, Mexico, New Zealand, Nigeria, Panama, Peru, the Philippines, Sierra Leone, Sri Lanka, State of Palestine, Switzerland, and Uruguay
- e. Elements for a Future Normative Framework Conducive to a Legally Binding Instrument to Address the Ethical Humanitarian and Legal Concerns Posed by Emerging Technologies in the Area Of (Lethal) Autonomous Weapons (LAWS); submitted by Chile and Mexico
- f. Working Paper on Lethal Autonomous Weapons Systems; submitted by the People's Republic of China
- g. *Working Paper;* submitted by Finland, France, Germany, the Netherlands, Norway, Spain, and Sweden
- h. *Draft Protocol VI;* submitted by Argentina, Ecuador, Costa Rica, Nigeria, Panama, the Philippines, Sierra Leone and Uruguay
- i. Application of International Law to Lethal Autonomous Weapons Systems (LAWS); submitted by the Russian Federation
- 14. The Group considered its draft final report during its second session in July 2022.

III. Conclusions

15. The CCW remains the appropriate forum for dealing with the issue of emerging technologies in the area of LAWS, within the context of its objectives and purposes. The right of parties to an armed conflict to choose methods or means of warfare, including weapons systems based on emerging technologies in the area of LAWS, is not unlimited. Furthermore, international law, in particular the United Nations Charter and International Humanitarian Law (IHL) as well as relevant ethical perspectives, should continue to guide the work of the Group.

16. On the basis of its consideration of proposals, the Group endorsed the following elements or possible measures, including taking into account the example of existing protocols within the Convention, and other options related to the normative and operational framework on emerging technologies in the area of lethal autonomous weapon systems:

17. A weapons system based on emerging technologies in the area of LAWS must not be possessed, developed or deployed with a view towards use, or used if it:

- a. is designed or used in such a way that its effects in attacks cannot be anticipated or controlled, as required in the circumstances by international humanitarian law, particularly the principles of distinction, proportionality, and precaution in attack;
- b. is designed or used to conduct attacks that would not be the responsibility of the human command under which the system would be used.

18. To address the risks of unintended engagements, incidental loss of life, injuries to civilians and damage to civilian objects resulting from the use of weapons systems based on emerging technologies in the area of LAWS, High Contracting Parties should elaborate and adopt measures across the life-cycle of the weapons system, including to:

- a. control, limit, or otherwise affect the types of targets that the system can engage;
- b. control, limit, or otherwise affect the duration, geographical scope, and scale of operation of the system, such as the incorporation of self-destruct, self-deactivation, or self-neutralization mechanisms into munitions and weapons systems;
- c. ensure human operators are informed and empowered to make decisions and exert control over the use of force, in the circumstances of their use, to comply with international humanitarian law;
- d. integrate risk assessments into the design, development, testing and deployment stages of the entire life-cycle of a weapon system;
- e. reduce automation bias in systems operators as well as unintended bias in artificial intelligence capabilities related to the use of the weapon system.

19. Compliance with international humanitarian law in the use of weapon systems based on emerging technologies in the area of LAWS requires, *inter alia*, good-faith human judgement based on the assessment of the information available at the time, and the ability of the operators to make decisions and exert control over the use of force. Moreover, humans must at all times remain accountable in accordance with applicable international law for decisions over the use of force.

20. Every internationally wrongful act of a State, including such conduct involving weapon systems based on emerging technologies in the area of LAWS entails international responsibility of that State. The conduct of a State's organs such as its agents and all persons forming part of its armed forces, is attributable to that State, including any such acts and omissions involving the use of a weapons system based on emerging technologies in the area of LAWS, in accordance with applicable international law.

21. In accordance with States' obligations under international law, in the study, development, acquisition, or adoption of a new weapon, means or method of warfare, including such potential weapons systems based on emerging technologies in the area of LAWS, States must determine whether its employment would, in some or all circumstances, be prohibited by international law.

22. Measures related to weapons systems based on emerging technologies in the area of LAWS should address the following topics:

- a. Weapons prohibited from use in all circumstances;
- b. Other prohibitions or restrictions on the use;
- c. Responsibility and accountability;
- d. Good practices related to human-machine interaction and legal reviews;
- e. Risk assessments and mitigation measures.

IV. Recommendations

- 23. The Group recommends that:
 - a. In the context of the objectives and purpose of the Convention, the Group is to intensify the consideration of proposals and elaborate, by consensus, possible measures, including taking into account the example of existing protocols within the Convention, and other options related to the normative and operational framework on emerging technologies in the area of lethal autonomous weapon systems, building upon the recommendations and conclusions of the Group of Governmental Experts related to emerging technologies in the area of lethal autonomous weapon systems, and bringing in expertise on legal, military, and technological aspects.

- b. the framework for emerging technologies in the area of lethal autonomous weapons systems should be developed by the Group, in accordance with the mandate agreed by the Sixth Review Conference.
- c. the rules of procedure of the Sixth Review Conference shall apply mutatis mutandis to the Group.
- d. the Group shall conduct its work and adopt its report by consensus and shall submit a report to the meeting of High Contracting Parties. The widest possible participation of all High Contracting Parties is to be promoted in accordance with the goals of the CCW Sponsorship Program.
- e. the Group shall meet for a total of [xx] days in Geneva in 2023.

V. Adoption of the report

24. [On 29 July 2022, the Group adopted its final report, as contained in CCW/GGE.1/2022/CRP.1, as orally amended, which will be issued as CCW/GGE.1/2022/3].

Annex III

List of documents

| Symbol | Title |
|------------------|---|
| CCW/GGE.1/2022/1 | Provisional agenda for 2022 sessions. Submitted by the Chairperson. |
| CCW/GGE.1/2022/2 | Provisional programme of work. Submitted by the Chairperson. |
| CCW/GGE.1/2022/3 | Report of the 2022 session of the Group of Governmental Experts on Emerging Technologies in the Area of Lethal Autonomous Weapons Systems |