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# CUS TOMER CONTRACT REQUIREMENTS United Kingdom Chinook Mk6 Requirement CUS TOMER CONTRACT CH-FHL/10004

#### CUSTOMER CONTRACT REQUIREMENTS

The following customer contract requirements apply to this contract to the extent indicated below. If this contract is for the procurement of commercial items under a Government prime contract, as defined in FAR Part 2.101, see Section 3 below.

- **1. DEFCONs** The following contract clauses are incorporated by reference from the United Kingdom (UK) Defence Contract Conditions (DEFCONs)which may be accessed on the UK Ministry of Defence (MOD) web site and apply to the extent indicated. In all of the following clauses, "Contractor" and "Offeror" mean Seller.
  - **129 Packaging (For Articles Other Than Ammunition and Explosives)** (JUL 2008). Seller shall comply with the requirements of clause 8, if applicable.
  - **516 Racial Discrimination** (JUN 2004). This contract incorporates the Appendix of DEFCON 516. In the Appendix, "the Subcontract" means this contract; "the Contractor" means Buyer, and "the Subcontractor" means Seller.
  - 520 Corrupt Gifts and Payments of Commission (AUG 2009).
  - 537 Rights of Third Parties (JUN 2002).
  - 607 Radio Transmissions (MAY 2008).
  - 608 Access and Facilities to be Provided by the Contractor (OCT 1998).
  - 611 Issued Property (OCT 2004).
  - 624 Use of Asbestos in Arms, Munitions or War Materials (APR 2010).
  - **638 Flights Liability and Indemnity** (DEC 2008). This DEFCON shall apply only to the post delivery maintenance check flight following shipment of aircraft to the UK.
  - 643 Price Fixing (JUL 2004).
  - 644 Marking of Articles (OCT 1998).
  - 648 Availability of Information (OCT 2002).
  - **656 Break** (OCT 2004). Break. Articles 1 through 5 of this provision applies if this contract is £50,000 or more. The term "Authority" means Buyer except in paragraph 3.a)i. The period of notice shall be that period specified in Buyer's contract with the U.K. Government.
  - **659 Security Measures** (JUN 2009). This DEFCON applies only if Seller is a United Kingdom supplier and this contract involves a Secret Matter, as defined in the Appendix to DEFCON 659. This contract incorporates the Appendix to DEFCON 659.

661 War Risk Indemnity (OCT 2006).

**68 Supply of Data for Hazardous Articles, Materials and Substances** (MAY 2011). "Authority" shall mean Buyer except in the last sentence of paragraph 1, where it means Authority and Buyer.

- **684** Limitation Upon Claims in Respect of Aviation Products (JAN 2004).
- 691 Timber and Wood Containing products Supplied Under the Contract (AUG 2002).
- **694** Accounting for Property of the Authority (FEB 2005). This provision only applies to the extent indicated in this contract and in this special provision.
- 76 Contractor's Personnel at Government Establishments (DEC 2006).
- 2. Prime Contract Special Provisions The following prime contract special provisions apply to this purchase order

Intellectual Property Rights .

- 8. Intellectual Property Rights
- 8.1 Definitions

The following definitions shall apply:

- 8.1.1 "Background Information" means Technical Information, excluding Foreground Information, that is required to be delivered under this contract:
- 8.1.2 "Demand Period" means the period of Buyer's prime contract under which this contract is placed plus a period of two years thereafter;
- 8.1.3 "Foreground Information" means any Invention first conceived or reduced to practice by Seller or its subcontractors using funding under this contract and Technical Information first conceived or developed by Seller or its subcontractors using funding under this contract;
- 8.1.4 "Independent Assessors" means any third party to this contract appointed to be the independent safety auditor or the independent technical evaluator for The Authority that is required in accordance with the UK Ministry of Defence's Joint Service Publication 553 (Military Airworthiness Regulations), but only when acting in such a capacity;
- 8.1.5 "Software" means computer programs, including those stored in integrated circuits, read-only memory or similar devices, computer program documentation, and computer databases, including modifications to any of the foregoing;
- 8.1.6 "Technical Information" means information of a scientific or technical nature relating to the Work, including information related to Inventions, designs, methods, processes, techniques, interfaces, data structures, architectures, analysis tools, modelling or simulation, models, prototypes, patterns, samples, schematics, experimental data, test data, reports, drawings, plans, specifications, photographs, collections of information, manuals, and Software. Technical Information does not include data concerned with the administration of the Contract, such as financial data, business processes, or management information. Technical Information also does not include any data systems, tools or applications that are developed using non-The Authority funding and that may be used to generate, modify or deliver Goods under this contract;
- 8.1.7 "Work" is the work product required to be generated and delivered under this contract; and
- 8.1.8 "Invention" means any new and useful art, process, machine, manufacture or composition of matter, or any new and useful improvement in any art, process, machine, manufacture or composition of matter.

- 8.2.1 In case of any claim, suit or action by a third party against Buyer or Buyer's customer alleging that any Goods or the use thereof infringe any patent or copyright in the U.S. or the European Union,
  - 8.2.1.1 Buyer shall promptly inform Seller in writing of such claim, suit or action, and
  - 8.2.1.2 At its own expense, Seller shall have the sole control and the full authority to defend the claim, including the rights to modify the Goods in a way that conforms with the requirements of this contract, and
  - 8.2.1.3 Buyer shall cooperate with Seller to the extent reasonably necessary in such defence by providing relevant and material information, documents, and witnesses in the possession or control of Buyer.
- 8.2.2 If Seller defends a claim, suit or action under paragraph 8.2.1, and such claim, suit or action results in a permanent injunction or court decision prohibiting the use of part or all of the Goods because such Goods infringe a third party right, Seller shall:
  - 8.2.2.1 Procure for Buyer the right to continue using the infringing Goods for however long the Goods are used by Buyer or Buyer's customer; or
  - 8.2.2.2 Replace or modify the infringing Goods with substantially equivalent non-infringing goods that conform with the requirements of this contract; or
  - 8.2.2.3 Modify the infringing Goods so they become non infringing but equivalent, and
  - 8.2.2.4 Indemnify Buyer against any monetary damages awarded to the third party as a result of the infringement.
- 8.2.3 Notwithstanding the above, Seller shall have no obligation hereunder if, without Seller's prior written consent, Buyer or Buyer's customer has modified the Goods or used the Goods in combination with any other equipment or software in a manner which results in infringement of the third party right, provided that the Goods would not separately infringe such right.
- 8.2.4 The actions listed in (8.2.1) or (8.2.2) shall not apply to infringement claims relating to any detailed designs, drawings, specifications, machinery, equipment or material supplied by Buyer to Seller for use in the construction or providing of Goods.
- 8.2.5 Buyer shall defend Seller and shall indemnify and hold Seller and its subcontractors harmless from and against any and all loss, damage, injury, liability, and claims, for any patent or copyright infringement arising from or relating to any detailed designs, drawings, specifications, machinery, equipment, or material supplied to Seller by Buyer under this contract.
- $8.3\ Intellectual\ Property\ Rights Foreground\ Information$ 
  - 8.3.1 Intellectual Property Rights in Foreground Information shall vest in and remain the property of Seller or its subcontractors as applicable. Seller or its subcontractors may mark such information with a legend indicating that it is Foreground Information, and Buyer shall retain such legend on all reproductions and derivatives of such information.

The following is an example of an acceptable legend:

THIS DOCUMENT CONTAINS INFORMATION THAT IS PROPRIETARY TO [SELLER] AND SHALL NOT, WITHOUT THE EXPRESS PERMISSION OF [SELLER], BE USED OR DUPLICATED EXCEPT AS AUTHORIZED BY CONTRACT OR STATUTE.

PERMITTED GOVERNMENT USE IS AS DEFINED IN [SPECIFY BOEING-SELLER CONTRACT NUMBER] and UK Mk6 CONTRACT NO. CH-FHL/10004

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8.3.2 Subject to compliance with applicable laws, Seller grants to Buyer's customer a non-exclusive, perpetual, irrevocable, world-wide, fully-paid and royalty-free license to exercise the Intellectual Property Rights in Foreground Information owned by Seller: to use, copy, modify, reproduce, perform, display, dispose of and disclose to others solely for the use, operation, maintenance, modification, repair, overhaul, maintenance and assessment of airworthiness and support of the Goods.

- 8.3.3 In the exercise of its rights under the license of 8.3.2, Buyer's customer may award contracts, may disclose in confidence the Foreground Information to bidders for such contracts, and may authorize the use of the information by any bidder for the purpose of such contracts. Buyer's customer shall require bidders to use Foreground Information only as is necessary for the bidder to bid or carry out the contracts.
- 8.3.4 If Buyer's customer, in exercising its rights hereunder, changes or authorizes its contractor to change, the Foreground Information of Seller or its authorized subcontractors, Buyer or Buyer's customer, as applicable, shall, or shall require its contractor to, identify the changes to the Foreground Information as the product of contractor, and to identify any product produced based upon such changed Foreground Information ("Unique Part") with a unique configuration number different from Seller's or Seller's authorized subcontractor's configuration number. Buyer assumes all responsibility and liability for any changes it makes to Foreground Information, shall hold Seller and its subcontractors harmless from responsibility for any injury or damage to Buyer, and shall defend and indemnify Seller and its subcontractors from and against any injury or damage to any third party, to the extent directly or indirectly arising from or caused by any such change.
- 8.3.5 Buyer or Buyer's customer as applicable shall ensure that all Unique Parts are marked in accordance with the following:

  Original Design Authority Leave Blank

  Current Design Authority Buyer (appropriate location)

  Manufacturer Code for Buyer's contractor
- 8.3.6 Buyer and Seller shall negotiate in good faith a list of deliverable items to be set forth in Annex [XX] to this contract that will be subject to the license rights set forth in this Article 8.3 regardless of the amount of Background Information they contain.
- 8.4 Intellectual Property Rights Background Information
  - 8.4.1 Intellectual Property Rights in Background Information vest in and remain the property of Seller or its subcontractors as applicable. Seller or its subcontractors may mark such information with a legend indicating that it is Background Information subject to the license rights conveyed herein, along with the Contract number, and Buyer shall retain such legend on all reproductions and derivatives of such information. If Seller inadvertently delivers Background Information without the proper legend, then Seller may request permission to correct the inadvertent omission of markings at its expense. Such request must be received by Buyer within six months following the delivery of such Technical Data, or any extension of that time approved by Buyer. The request must identify the Technical Data that should have been marked, demonstrate that the omission of the marking was inadvertent, and acknowledge in writing that Buyer has no liability with respect to any disclosure, reproduction or use of the Technical Data made prior to the addition of the marking or resulting from the omission of the marking. To the extent practicable, such permission shall be granted.

The following is an example of an acceptable legend:

THIS DOCUMENT CONTAINS INFORMATION THAT IS PROPRIETARY TO [SELLER] AND SHALL NOT, WITHOUT THE EXPRESS PERMISSION OF [SELLER], BE USED OR DUPLICATED EXCEPT AS AUTHORIZED BY CONTRACT OR STATUTE.

PERMITTED GOVERNMENT USE IS AS DEFINED IN [SPECIFY SUBCONTRACT NUMBER] AND UK Mk6 CHINOOK CONTRACT NO. CH-FHL/10004 "BACKGROUND INFORMATION ONLY"

- 8.4.2 Subject to compliance with applicable laws, Seller grants to Buyer's customer a non-exclusive, world-wide, fully-paid and royalty-free license to use, copy, modify, reproduce, perform, display, dispose of and disclose Background Information owned by Seller solely within Buyer's customer's organisation for the use, operation, maintenance, repair, overhaul, maintenance and assessment of airworthiness and support of the Goods. Notwithstanding any restriction in this Article, it is not to be construed as limiting or waiving any pre-existing rights of Buyer or Buyer's customer.
- 8.4.2.1 Subject to compliance with applicable laws, Seller grants to Buyer's customer a non-exclusive, world-wide, fully-paid

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and royalty-free license to disclose Background Information owned by Seller within the Independent Assessors' organisations, including the right to sublicense the Independent Assessors to use and make copies of such Background Information, for the assessment of airworthiness.

#### 8.4.3 Reserved

- 8.4.4 Except to the extent it would be prohibited from doing so by applicable laws, Buyer shall restrict its contractors, agents and other third parties, including the Independent Assessors, performing work on Buyer's behalf from reverse engineering, decompiling, disassembling, modifying, or creating derivative works of Background Information that is furnished as Software executable or object code, in whole or in part, or attempting in any way to determine the related source code. Buyer shall respect Seller's rights in digital rights management.
- 8.4.5 Where Foreground Information or Background Information is owned by a subcontractor at any tier, Seller shall use reasonable commercial efforts to negotiate Intellectual Property Rights for Buyer's customer in accordance with Articles 8.3 and 8.4, or to negotiate for the subcontractor involved to convey directly to Buyer's customer such rights. Seller agrees to notify Buyer of the circumstances when any subcontractor does not agree to convey such rights and will consult with Buyer as to how best to proceed before placing any such subcontract.
- 8.4.6 Buyer's customer's license rights under 8.4 do not include the right to produce any products that are not for end use by Buyer's customer, nor, except as set forth herein and except to the extent permitted by applicable laws, do such rights include the right to reverse engineer Seller's Goods.
- 8.4.7 Notwithstanding anything in this Article 8.4 that may be construed to the contrary, the license set out in 8.4 shall not apply to any Software that is subject to detailed license conditions set out elsewhere in this contract.
- 8.4.8 Buyer's customer may not use, and may not license or permit others to use, Intellectual Property Rights or any Foreground or Background Information in commercial sales in competition with Seller. This provision shall not be interpreted as preventing Buyer's customer from exercising its rights conveyed under this contract.

## 8.5 Maintenance of Technical Data

- 8.5.1 During the Demand Period Seller shall maintain at his works at least one complete set of the Technical Data required to be delivered under this contract.
- 8.5.2 The master set of such Technical Data may be altered by Seller before the expiration of the Demand Period provided the configuration representing the Chinook Mk6 Aircraft in current service is maintained in accordance with the required Configuration Control Document.
- 8.5.3 During the Demand Period, Buyer may, by notice in writing to Seller, require Seller to supply additional copies of the Technical Data as may be specified in the notice.
- 8.5.4 Such additional copies shall be supplied within the period specified in the notice. When the Technical Data is ordered, Seller may charge a fair and reasonable price for converting the Technical Data into the prescribed form, for reproduction and delivery. Buyer may make copies of any Technical Data supplied under this Article, and use and disclose such Technical Data (or copies of them) as set forth in this contract.
- 8.5.5 If Seller enters into another contract with Buyer regarding maintenance of the Technical Data, Seller's obligation under this condition shall be governed by that contract at the end of the Demand Period. Otherwise he may destroy or amend the Technical Data as he sees fit, but before destroying the Technical Data he shall offer to supply it to Buyer and give Buyer 60 days to request such supply.

#### 8.6 Non-Disclosure

8.6.1 Subject to the Parties' compliance with applicable laws, and subject to Buyer, Buyer's customer's and Seller's rights under this contract, each Party shall protect as set forth herein any information received from the other Party under or in connection with this contract that the disclosing Party considers proprietary or confidential ("Proprietary Information") and that, if disclosed in tangible form, has been marked with an appropriate proprietary legend such as PROPRIETARY or CONFIDENTIAL, or another restrictive legend allowed under this contract, and if disclosed in some other form (e.g., orally or visually), has been identified as proprietary at the time of original disclosure and summarized in a writing conspicuously marked with an such a

legend and delivered to the receiving Party within 30 days of original disclosure. Such Proprietary Information may include Background Information or Foreground Information, but those categories of information shall instead be subject to the "Background Information" or "Foreground Information" articles of this contract, respectively. Each Party shall protect Proprietary Information except to the extent disclosure is required by law, by any governmental or other regulatory authority or by a court or other authority of competent jurisdiction and, in the case of Buyer, to the extent Buyer has no right to refuse disclosure under the law of Buyer's country. Where this exception applies, the receiving Party shall, to the extent legally permitted to do so, provide prompt written notice to the disclosing Party prior to proceeding with such disclosure and shall afford the disclosing Party the right to resist such release.

- 8.6.2 The receiving Party shall, at the disclosing Party's written request, return to the disclosing Party all such Proprietary Information of the disclosing Party when no longer needed for completion of this contract, or shall, at the disclosing Party's option, destroy all such information and certify as to such destruction to the disclosing Party.
- 8.6.3 The receiving Party may use and copy the disclosing Party's Proprietary Information solely for the purpose of performing the receiving Party's obligations under this contract or exercising the receiving Party's rights under this contract, and such information shall remain the property of the disclosing Party or a third party as applicable. The receiving Party may disclose the disclosing Party's Proprietary Information to employees of the receiving Party who have a need-to-know the Proprietary Information for the purposes of performing the receiving Party's obligations under this contract or exercising the receiving Party's rights under this contract. Notwithstanding the restrictions set forth in this 8.6, Seller may disclose to a subcontractor Proprietary Information of Buyer as may be necessary to perform the subcontract, on the condition that the subcontractor agrees that such information will be used solely for the purposes of such subcontract. In addition, each receiving Party may disclose the other Party's Proprietary Information to the receiving Party's advisers, agents and contract labor for the purpose of performing the receiving Party's obligations under this contract, provided that such advisers, agents and contract labor are subject to written obligations of confidentiality no less stringent than those set forth in this 8.6.
- 8.6.4 Neither Party's obligations under this Condition 8.6 apply to any information that:
  - 8.6.4.1 The receiving Party knew and held without restriction as to further disclosure when the disclosing Party disclosed the information under this contract: or
  - 8.6.4.2 is publicly available from a source other than the disclosing Party other than as a result of the receiving Party's breach of its obligations under this Article; or
  - 8.6.4.3 is or becomes known to the receiving Party from a source other than the disclosing Party who is authorized to disclose the information to the receiving Party; or
  - 8.6.4.4 is independently developed by the receiving Party without use of the information of the disclosing Party.
- 8.6.5 The receiving Party will satisfy its obligations hereunder to protect Proprietary Information from misuse or unauthorized disclosure by exercising reasonable care. Such care will include protecting such information using those practices the receiving Party normally uses to restrict disclosure and use of its own information of like importance.
- 8.6.6 The nondisclosure obligations set forth herein shall persist for five years after termination or expiration of this contract.
- 8.6.7 The Parties acknowledge that the disclosing Party may suffer irreparable harm if the receiving Party fails to comply with its nondisclosure obligations set forth herein, and that monetary damages in that event would be inadequate to compensate the disclosing Party. Consequently, the disclosing Party shall be entitled, in addition to any monetary relief as may be recoverable by law, to any temporary, preliminary or permanent injunctive relief as may be necessary to restrain any continuing or further breach by the receiving Party, without showing or proving any actual damages sustained by the disclosing Party and without the necessity of posting any bond or, if required, a bond of minimal value only.
- 8.6.8 Information disclosed under this contract that is not marked Proprietary or marked with any restrictive legend may be copied, used and disclosed by the receiving Party for any purpose whatsoever.

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#### 8.7 Data Access - Safety Verification

8.7.1 Seller shall, subject to export restrictions, make reasonable provision for access, by Buyer's customer and/or Buyer customer's agent, at Seller's premises, or if not reasonably possible at Seller's premises, at the premises of the applicable supplier, to information relating to the following systems, including the software contained therein:

DAFCS - Digital Automatic Flight Control System

EGI - Embedded GPS / Inertial Navigation System

MFD – Multi-Function Display

EFIS – Electronic Flight Instrument System

VOR/ILS/ADF - VHF Omni-Range/Instrument Landing System/Automatic Direction Finder

SFD – Standby Flight Display

VM M - Vehicle Management Module

Access to such information shall be provided prior to December 2014 and is subject to Seller's approval of inspecting personnel, which shall not be unreasonably withheld.

- 8.7.2 Seller shall use reasonable endeavours to secure access on similar terms from sub-tier suppliers. Seller shall be entitled to an equitable adjustment, as agreed by both Seller and Buyer, for any impacts to cost or schedule as a result of inspection required under this clause, such agreement not to be unreasonably withheld.
- 8.7.3 The access shall be limited to information necessary for the purposes of determination / confirmation of safety and airworthiness and verification of compliance of the systems and the software contained within them in accordance with the DO-178b and DO-254 standards for the purposes of the Chinook Mk6 D&M Contract only. Seller acknowledges that Buyer's customer or Buyer's customer's agent will require the ability to inspect the necessary information and to generate a report summarizing the findings, but will not need to reproduce copies of accessed information in the report. Any access to the reports generated shall be limited to Buyer's and Buyer's customer's personnel, for the purposes of determination / confirmation of safety and airworthiness and verification of compliance on the Chinook Mk6 programme only and shall be distributed strictly on a 'need-to-know' basis.
- 8.7.4 Seller and Buyer acknowledge that Seller's suppliers may seek agreement directly with Buyer's customer or Buyer's customer's agent, under terms consistent with this paragraph, for such access. In the event Buyer's customer's analysis indicates additional systems to be of high or medium integrity, Seller shall seek agreement from the applicable supplier to provide similar access for those systems.

# $\label{lem:protection} \textbf{Protection of RESTRICTED Information} \; .$

(The following excerpt from Buyer's contract with the MOD applies only if Seller is a U.S. Supplier. "The Authority" is the Secretary of State for Defence acting through the Chinook Project Team. "The Contractor" means Seller. Seller's request for the Authority's written consent (see 37.7) or for an interpretation (see 37.12) shall be through Buyer.)

- 37.7 Protection of RESTRICTED Information.
  - 37.7.1 Except with the consent in writing of the Authority, The Contractor shall not disclose the Contract or any of its provision to any person other than a person employed by The Contractor. It must be confined to those members of the staff whose access to the information is essential for the purpose of his duties.
  - 37.7.2 Except with the consent in writing of the Authority, The Contractor shall not make use of the Contract or any information issued or furnished by or on behalf of the Authority otherwise than for the purpose of the Contract, and, save as provided for in Condition 37.7.3 The Contractor shall not make any Article or part thereof similar to the Articles for any other purpose.
  - 37.7.3 Subject to any rights of third parties, nothing in this Condition 37 shall, however, constrain the use for any purpose by The Contractor of any specifications, plans, drawings and other documents, the rights of which vest in him otherwise than as a result of Work carried out under this Contract.

Effective: 08/08/2011

- 37.7.2 Any samples or patterns or any specifications, plans, drawings or any other documents issued by or on behalf of the Authority for the purposes of the Contract remain the property of the Authority and shall be returned on completion of the Contract.
- 37.7.3 When not in use RESTRICTED documents shall be stored under appropriate protection.

# 37.8 Loss

37.8.1 Any loss of a RESTRICTED document shall be reported as soon as reasonably possible but without delay to the Authority.

# 37.9 Transmission

37.9.1 RESTRICTED documents shall be transmitted in such a way as to make sure that no unauthorised person has access. Postal transmissions outside of the company must be in at least one envelope/package. Commercial couriers may be used, however, transmission via public networks such as the Internet or any other form of electronic connectivity is not permitted without the use of encryption mutually acceptable to the appropriate security authorities. Telephone conversations, video conferencing or facsimile transmissions within country may be in clear text.

### 37.10 Use of IT Systems

37.10.1 Use of IT systems shall be in accordance with the standard Boeing policy for Intellectual Property Management and Information Protection.

#### 37.11 Destruction

37.11.1 As soon as soon as no longer required RESTRICTED information/material shall be destroyed in such a way as to make reconstitution very difficult or impossible, for example, by burning, shredding or tearing into small pieces. Unwanted RESTRICTED information/material, which cannot be destroyed in such a way, shall be returned to the Authority.

# 37.12 Interpretation

37.12.1 Advice regarding the interpretation of the above requirements should be sought from the Authority.

## **Montreal Protocol Substances**.

- 1. Seller shall identify which (if any) substances listed below are contained in any item or used in connection with any Article (goods) or Service to be provided by Seller under this contract.
- 2 Seller shall provide Buyer's Authorized Procurement Representative a list within 30 days of contract award specifying:
  - 2.1 All Montreal Protocol Substances (adopting the nomenclature used below) to be used in the execution of any task under this contract;
  - 2.2 The quantity of any such Montreal Protocol Substance; and
  - 2.3 Where such Montreal Protocol Substances shall be used or contained.
- 3 If appropriate, Seller shall provide confirmation of a 'Nil Return' in respect of Condition (paragraph) 2 above.
- 4 If at any time during the period of this contract Seller changes its use of any Montreal Protocol Substances, Seller shall forthwith provide Buyer's Authorized procurement Representative an amended version of the information provided under Condition (paragraph) 2.

CFCs	Production of	controlled CFCs	has stopped.
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CFC-11(trichlorofluoromethane)	CFC-211
CFC-12(dichlorodifluoromethane)	CFC-212
CFC-13	CFC-213
CFC-111	CFC-214
CFC-112	CFC-215
CFC-113 (trichlorotrifluoroethane)	CFC-216

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CFC-114 (dichlorotetrafluoroethane) CFC-217 CFC-115 (chloropentafluoroethane)

The above substances are also used in blends: e.g. CFC-500 (CFC-12/HFC-152a) CFC-502 (CFC-115/HCFC-22).

Halons - Production of controlled Halons has stopped.
Halon-1211 (bromochlorodifluromethane - BFC)
Halon-1301 (bromotrifluoromethane - BTM)
Halon-2402

# **HBFCs** - Production has stopped.

$C_2 H_2 F_2 Br_2$	$C_3$ HF <sub>4</sub> Br <sub>3</sub>	$C_3 H_3 F_2 Br_3$
C <sub>2</sub> H <sub>2</sub> F <sub>3</sub> Br	C 3HF5 Br2	C <sub>3</sub> H <sub>3</sub> F <sub>3</sub> Br <sub>2</sub>
C <sub>2</sub> H <sub>3</sub> FBr <sub>2</sub>	C <sub>3</sub> HF <sub>6</sub> Br	$C_3 H_3 F_4 Br$
$C_2 H_3 F_2 Br$	$C_3 H_2 FBr_5$	C <sub>3</sub> H <sub>4</sub> FBr <sub>3</sub>
C <sub>2</sub> H <sub>4</sub> FBr	$C_3 H_2 F_2 Br_4$	C <sub>3</sub> H <sub>4</sub> F <sub>2</sub> Br <sub>2</sub>
	$C_3 H_2 F_3 Br_3$	C <sub>3</sub> H <sub>4</sub> F <sub>3</sub> Br
C <sub>3</sub> HFBr <sub>6</sub>	$C_3 H_2 F_4 Br_2$	C <sub>3</sub> H <sub>5</sub> FBr <sub>2</sub>
C <sub>3</sub> HF <sub>2</sub> Br <sub>5</sub>	$C_3 H_2 F_5 Br$	$C_3 H_5 F_2 Br$
C <sub>3</sub> HF <sub>3</sub> Br <sub>4</sub>	C <sub>3</sub> H <sub>3</sub> FBr <sub>4</sub>	C <sub>3</sub> H <sub>6</sub> FBr
	C <sub>2</sub> H <sub>2</sub> F <sub>3</sub> Br C <sub>2</sub> H <sub>3</sub> FBr <sub>2</sub> C <sub>2</sub> H <sub>3</sub> F <sub>2</sub> Br C <sub>2</sub> H <sub>4</sub> FBr C <sub>3</sub> HFBr <sub>6</sub> C <sub>3</sub> HF <sub>2</sub> Br <sub>5</sub>	C 2H2 F3 Br C 3HF5 Br2 C2 H3 FBr2 C3 HF6 Br C2 H3 F2 Br C3 H2 FBr5 C2 H4 FBr C3 H2 F2 Br4 C3 H2 F3 Br3 C3 HFBr6 C3 H2 F4 Br2 C3 HF2 Br5 C3 H2 F5 Br

**HCFCs** - Production to be run down and phased out by 2015. Certain use controls apply.

HCFC-21	HCFC-141	HCFC-225ca	HCFC-243
HCFC-22	HCFC-141b	HCFC-225cb	HCFC-244
HCFC-31	HCFC-142	HCFC-226	HCFC-251
HCFC-121	HCFC-142b	HCFC-231	HCFC-252
HCFC-122	HCFC-151	HCFC-232	HCFC-253
HCFC-123	HCFC-221	HCFC-233	HCFC-261
HCFC-124	HCFC-222	HCFC-234	HCFC-262
HCFC-131	HCFC-223	HCFC-235	HCFC-271
HCFC-132	HCFC-224	HCFC-241	
HCFC-133	HCFC-225	HCFC-242	

CARBON TETRACHLORIDE (CCI <sub>4</sub> ) - Production has stopped. 1,1,1-TRICHLOROETHANE (C<sub>2</sub> H<sub>3</sub> CI <sub>3</sub>) - Production has stopped. METHYL BROMIDE (CH3Br) - Production limits apply.