Additional Clarifications on Reporting Guidance

On October 11, 2006, EPA circulated its suggested guidance for emissions and product content reporting under the 2010/15 PFOA Stewardship Program. Following requests for further clarification of the guidance provisions, EPA circulated additional information concerning the guidance to all of the participating companies on October 20, 2006 to ensure that a common understanding is maintained.

Following that communication, a further question received on the guidance prompted EPA to realize that there was an error in the forms section of the guidance document distributed on October 11, 2006 that may still be causing confusion. In the cover message on October 11, 2006 transmitting the guidance document and the Word format data submission tables, EPA noted that the originally separate fields for reporting PFOA and higher homologue product content in Appendices E and F had been combined into a single field on the public summary report form to avoid the disclosure of confidential business information (CBI). In making this change, however, EPA neglected to combine these two fields into a single field on the public summary emissions report form as well, for the same reason.

It was EPA's intent to make this change in both locations on the public summary reporting forms in Appendices E and F, and we regret any confusion that this oversight may have caused. A Word file containing the revised reporting forms is attached. Footnotes to the form tables have been edited to conform to this change.

Please note that, although these changes were effected in the public summary reporting form, they do not affect the detailed reports that companies are to submit in support of the public summary reports. As indicated in the guidance, information in the detailed reports may be submitted as CBI where necessary, providing that a sanitized copy is also provided for the public docket.

The reporting guidance document and all clarifications will be included in the Stewardship Program docket, EPA-HQ-OPPT-2006-0621, and will be posted to the PFOA Stewardship Program website.

Appendix C

Draft Facility Report on Emissions

2010/15 PFOA Stewardship Program
Draft Facility Report on Emissions

I. CHEMICAL IDENTIFICATION

Identify the chemical for which you are submitting information:

Chemical name:_____

CAS number:_____

II. COMPANY IDENTIFICATION

Identify the company and location of the facility submitting information:

Company name:_____

Site location:_____

Identify a company technical contact who can respond to inquiries about the information submitted:

Technical contact:_____
Phone:_____
Address:_____

III. ON-SITE ACTIVITIES

Calendar year for which you are reporting: Jan 1, 20___ to Dec 31, 20 ___

Provide the amount of chemical identified above for the reporting year at specific site:

Imported (virgin) _____kgs/yr

Imported (externally recycled) _____kgs/yr

Manufactured _____kgs/yr

Estimate the amount of subject chemical distributed off-site:

_____% of manufacture/import

Provide the amount used (including any that was manufactured, imported [virgin or externally recycled], or internally recycled) of the subject chemical for the reporting year at specific site:

_____kgs/yr

Narrative Description and Process Flow Schematic:

Provide overall material balance of the chemical being reported, showing releases and products (kgs/year). Use the following page to provide a narrative description and process flow schematic of on-site activities, and include information that gives an understanding of the nature and extent of potential exposures to the subject chemical. Attach additional pages if desired. The narrative and process flow schematic should cover major unit operations and chemical conversions for manufacturing and on-site uses, if applicable. The narrative should provide insight into why and how releases are caused by the process. The schematic should show the points of release of the subject chemical in the workplace and to the environment. In the event the subject chemical is used in many different processes, provide information on each major process instead of each individual process.

Narrative Description and Process Flow Schematic:

IV. SITE RELEASE AND TRANSFER INFORMATION

(For manufacturing and on-site processing/use if applicable)

In this section, estimate the total media-specific releases after on-site treatment of the chemical from your facility. You may estimate the releases by using monitoring data or any other method you believe appropriate. Estimates should be reported in kgs per year for the reporting period. Enter the values as whole numbers to no more than two significant figures. For example, if your annual releases are estimated to be 12,360 kgs, an estimate of 12,000 kgs should be reported.

Estimate the number of days per year the release occurs. Enter a whole number with a maximum of 2 significant figures.

Insert "NA" for release activities not associated with the chemical or "0" for releases of less than 0.5 kgs per year.

For all releases, the source of data and/or basis for determination should be described in detail. Suggested information about the possible sources/basis includes:

1. If the source/basis is an analytical measurement, then
   - Describe the method (including analytical standards used, sampling, sample treatment, analysis).
   - Describe the uncertainties and assumptions made.
   - Give the Level of Detection (LOD)/Level of Quantification (LOQ).

2. If the source/basis is a mass balance, then
   - Show the mass balance calculation.
   - Show that the mass balance closes.
   - If the mass balance does not close, then report the fraction of total feedstock that is not accounted for and the assumptions you made to correct the balance. Describe the uncertainties.

3. If the source/basis is other than measurement or mass balance, then
   - Describe the method used. For example, if engineering calculations are used, give a general description and state your assumptions. Describe the uncertainties.

Part IV (cont.)

A. ON-SITE AIR RELEASES

Estimate the total fugitive or non-point releases to air and the number of days per year the releases occur. These releases include equipment leaks from valves, pump seals, flanges, compressors, sampling connections, and open-ended lines; evaporative losses from surface impoundments and spills; releases from building ventilation systems; and, any other fugitive or non-point air emission.

In addition, estimate the total releases that occur through stacks, vents, pipes, or other confined air streams as stack or point source releases. Include storage tank emissions and releases from pollution control equipment.

If desired, you can provide estimates of the accuracies of your release estimates.

	Estimated Total Annual Releases (kgs)	Estimated % Accuracy (Optional)	# Days/year Release Occurs
Fugitive (non-point)	_____	_____	_____
Stack (point)	_____	_____	_____

Basis for each release estimate:
(See discussion on source/basis in beginning of Section IV.)

Comments:
(This section is available to clarify your responses. Attach additional pages if desired.)

Part IV (cont.)

B. WATER RELEASES FROM SITE

Estimate the total releases of the chemical leaving the fence line of your facility from all discharge points to all streams or water bodies. Include all discharges from process outfalls such as pipes, open trenches, releases from on-site wastewater treatment, and contribution from storm water runoff, if applicable. Do not include discharges to a POTW or other off-site wastewater treatment facilities. If desired, you can provide an estimate of the accuracy of your release estimate.

	Estimated Total Annual Releases (kgs)	Estimated % Accuracy (Optional)	# Days/year Release Occurs
Water releases:	_____	_____	_____

Enter the names of the streams or water bodies to which the facility directly discharges the chemical. Also, enter the NPDES permit number for the facility. If more than one number is assigned to the facility, list each number for the appropriate discharge quantity and receiving water identified.

Receiving Water Name(s):_____

NPDES number(s):_____

Basis for each release estimate:
(See discussion on source/basis in beginning of Section IV.)

Comments:
(This section is available to clarify your responses. Attach additional pages if desired.)

Part IV (cont.)

C. ON-SITE LAND RELEASES

Estimate the total releases of the chemical for each category of land disposal, if applicable. Estimate only on-site releases. Do not estimate leaks from landfills separately. This should be accounted for in your estimate of total landfill release.

Releases to land treatment/land amendment include all waste containing the chemical that is applied or incorporated into soil on-site. Do not include waste that is landfilled.

Surface impoundments are natural topographic depressions, man-made excavations, or diked areas formed primarily of earthen materials designed to hold an accumulation of the chemical.

Underground injection is the technology of placing fluids underground, in porous formations of rocks, through wells or other similar conveyance systems.

Other releases include any amount of the chemical that is released to land other than those listed. An example is the accidental release of the chemical from an underground pipeline or storage tank.

	Estimated Total Annual Releases (kgs)	Estimated % Accuracy (Optional)
Landfill	_____	_____
Land Treatment/Land Amendment	_____	_____
Surface Impoundments	_____	_____
Underground Injection	_____	_____
Other (specify):	_____	_____

Basis for each release estimate:
(See discussion on source/basis in beginning of Section IV.)

Comments:
(This section is available to clarify your responses. Attach additional pages if desired.)

Part IV (cont.)

D. OFF-SITE TRANSFERS

Estimates of off-site transfers should be similar in accuracy and precision to previous release estimates.

Dl. Transfer to Publicly Owned Treatment Works (POTW)

Number of days/year the release occurs: _____

Estimate the total quantity of the subject chemical, not the waste stream, transferred to the POTW. Complete section below for each POTW to which your facility discharges wastewater containing the chemical. Enter the POTW's NPDES permit number, if known.

Annual Transfer (kgs): _____

Estimated % Accuracy of Transfer Estimate (optional) _____

POTW Name:_____

Street Address: _____

City: _____ County: _____

State: _____ Zip Code: _____

NPDES number: _____

Basis for each release estimate:
(See discussion on source/basis in beginning of Section IV.)

Comments:
(This section is available to clarify your responses. Attach additional pages if desired.)

Part IV (cont.)

D2. Transfers to other off-site locations

In this section, estimate the quantity of the subject chemical, not the waste stream, transferred and the accuracy of the estimate for each category listed. If your facility sends the subject chemical in waste to an off-site location where some of the chemical will be recycled and the remainder will be treated, estimate each amount separately (i.e., waste treatment and recycling activities).

	Estimated Annual Transfers (kgs)	Estimated % accuracy (Optional)
Incineration	_____	_____
Wastewater Treatment (Excluding POTW)	_____	_____
Underground Injection	_____	_____
Hazardous Waste (RCRA Subtitle C) Landfill	_____	_____
Other Landfill	_____	_____
Recycle or Recovery (Does not include internally recycled)	_____	_____
Internally Recycled	_____	_____
Unknown or Other	_____	_____

Basis for each release estimate:
(See discussion on source/basis in beginning of Section IV.)

Comments:
(This section is available to clarify your responses. Attach additional pages if desired.)

Appendix D

Draft Facility Report on Product Content

2010/15 PFOA Stewardship Program

Draft Facility Report on Product Content

I. CHEMICAL IDENTIFICATION

Identify the product (e.g fluoropolymer dispersion) for which you are submitting information:

Product name:_____

Product description (including concentrations of perfluoroalkyl chemicals identified in Section IV below and year of production):

_____

_____

II. COMPANY IDENTIFICATION

Identify the company and location of the facility submitting information:

Company name:_____

Site location:_____

Identify a company technical contact who can respond to inquiries about the information submitted:

Technical contact:_____
Phone:_____
Address:_____

III. PRODUCTION

Calendar year for which you are reporting: Jan 1, 20___ to Dec 31, 20 ___

Provide the amount of the product for the reporting year at each specific site:

Imported _____kgs/yr

Manufactured _____kgs/yr

IV. PRODUCT CONTENT

A. CONCENTRATIONS OF RELEVANT PERFLUOROALKYL CHEMICALS

Please provide the concentrations (ppb) of various perfluoroalkyl chemicals in your product. For chemicals for which you do not have actual data, please provide range estimates.

The following is a nonexhaustive list of chemicals that should be included:

PFOA and its salts

- Octanoic acid, pentadecafluoro- (CAS 335-67-1)
- Octanoic acid, pentadecafluoro- ammonium salt (CAS 3825-26-1)

PFOA precursors

- Octane, 1,1,1,2,2,3,3,4,4,5,5,6,6,7,7, 8,8-heptadecafluoro-8-iodo- (CAS 507-63-1)
- 1-Decanol, 3,3,4,4,5,5,6,6,7,7,8,8,9,9,10,10,10-heptadecafluoro- (CAS 678-39-7)
- 1-Decene, 3,3,4,4,5,5,6,6,7,7,8,8,9,9,10,10,10-heptadecafluoro- (CAS 21652-58-4)
- 2-Propenoic acid, 3,3,4,4,5,5,6,6,7,7,8,8,9,9,10,10,10-heptadecafluorodecyl ester (CAS 27905-45-9)
- 2-Propenoic acid, 2-methyl-, 3,3,4,4,5,5,6,6,7,7,8,8,9,9,10,10,10-heptadecafluorodecyl ester (CAS 1996-88-9)
- 2-Decenoic acid, 3,4,4,5,5,6,6,7,7,8,8,9,9,10,10,10-hexadecafluoro- (CAS 70887-84-2)
- Decanoic acid, 3,3,4,4,5,5,6,6,7,7,8,8,9,9,10,10,10-heptadecafluoro- (CAS 27854-31-5)

Higher homologues

- Dodecane, 1,1,1,2,2,3,3,4,4,5,5,6,6,7,7,8,8,9,9,10,10,11,11,12,12-pentacosafluoro-12-iodo- (CAS 307-60-8)
- Decane, 1,1,1,2,2,3,3,4,4,5,5,6,6,7,7,8,8,9,9,10,10-heneicosafluoro-10-iodo- (CAS 423-62-1)
- Nonanoic acid, heptadecafluoro- (CAS 375-95-1)
- Decanoic acid, nonadecafluoro- (CAS 335-76-2)
- 1-Decanol, 3,3,4,4,5,5,6,6,7,7,8,8,9,9,10,10,10-heptadecafluoro- (CAS 678-39-7)
- Decane, 1,1,1,2,2,3,3,4,4,5,5,6,6,7,7,8,8-heptadecafluoro-10-iodo- (CAS 2043-53-0)
- Dodecane, 1,1,1,2,2,3,3,4,4,5,5,6,6,7,7,8,8,9,9,10,10-heneicosafluoro-12-iodo- (CAS 2043-54-1)
- 2-Propenoic acid, 3,3,4,4,5,5,6,6,7,7,8,8,9,9,10,10,10-heptadecafluorodecyl ester (CAS 4980-53-4)
- 2-Propenoic acid, 2-methyl-, 3,3,4,4,5,5,6,6,7,7,8,8,9,9,10,10,11,11,12,12,12-heneicosafluorododecyl ester (CAS 17741-60-5)

Part IV (cont.)

B. ANALYTICAL METHODS

Analyses should be conducted using the most accurate instrumentation and procedures available as of the time of testing. Please provide detailed information on the methods used (including analytical standards used, sampling, sample treatment, analysis), assumptions made, uncertainties and detection limits (LOD, LOQ) for the data provided.

Appendix E

Draft Company Report: Summary of Baseline Emissions and Product Content

2010/15 PFOA Global Stewardship Program
Draft Company Report: Summary of Baseline Emissions and Product Content

SECTION 1: REPORT DATE	October 2006

SECTION 2: COMPANY IDENTIFICATION	
2a	Company Name
	Street Address

SECTION 3: SUMMARY OF EMISSIONS					
Reporting Period (use calendar year - e.g. Jan 1, 2000 to Dec 31, 2000)					
3a	Operations	Chemical category	Releases to all environmental media from fluoropolymer and telomer manufacture		
			kgs	$\frac{\text{kgs of category}}{\text{kgs of fluoropolymers}^{1}}$	$\frac{\text{kgs of category}}{\text{kgs of telomers}}$
	U.S. facilities	PFOA, PFOA salts and higher homologues			
		Precursors			
3b	Non-U.S. facilities	PFOA, PFOA salts and higher homologues			
		Precursors			
3c	Please provide information on the methods, assumptions, uncertainties and detection limits for the data provided above.				

SECTION 4: SUMMARY OF PRODUCT CONTENT					
Reporting Period (use calendar year - e.g. Jan 1, 2000 to Dec 31, 2000)					
4a	Product type		Fluoropolymer dispersions	Other fluoropolymers[1]	Telomer based products
	Production volume (kgs/year)[2]				
4b	Operations	Chemical category	Concentration[3]		
			Fluoropolymer dispersions[4] (ppm wet-weight)	Other fluoropolymers[1,5] (ppb dry-weight)	Telomer based products[6] (ppb dry-weight)
	U.S. facilities	PFOA, PFOA salts and higher homologues			
		Precursors			
4c	Non-U.S. facilities	PFOA, PFOA salts and higher homologues			
		Precursors			
4d	Please provide information on the methods, assumptions, uncertainties and detection limits for the data provided above.				

[1] Fluoropolymers manufactured with PFOA or related chemicals.
[2] Use the following ranges: (1) Zero (2) > 0 – 10 kgs; (3) > 10 kgs – 100 kgs; (4) > 100 kgs – 1,000 kgs; (5) > 1,000 kgs – 10,000 kgs; (6) > 10,000 kgs – 100,000 kgs; (7) > 100,000 kgs – 1,000,000 kgs; (8) Over 1,000,000 kgs.
[3] Concentration should reflect the concentration of chemical in the product as sold by the reporting company. If the reporting company has information concerning the concentration of chemical in the product as used by others – for example, as incorporated by dilution into a formulation – that additional information would also be helpful.
[4] This value should be expressed as a weighted average concentration and range.
[5] This value should be expressed as a maximum concentration.
[6] This value should be expressed as a simple (not weighted) average and range.

Appendix F

Draft Company Annual Report: Summary of Reductions in Emissions and Product Content

2010/15 PFOA Global Stewardship Program
Draft Company Report: Summary of Reductions in Emissions and Product Content

SECTION 1: REPORT DATE	October 20__

SECTION 2: COMPANY IDENTIFICATION	
2a	Company Name
	Street Address

SECTION 3: SUMMARY OF EMISSIONS						
Reporting Period (use calendar year - e.g. Jan 1, 2005 to Dec 31, 2005)						
3a	Operations	Chemical category	Releases to all environmental media from fluoropolymer and telomer manufacture			% Reduction of total kgs released from baseline year
			kgs	$\frac{\text{kgs of category}}{\text{kgs of fluoropolymers}}$[1]	$\frac{\text{kgs of category}}{\text{kgs of telomers}}$	
	U.S. facilities	PFOA, PFOA salts and higher homologues				
		Precursors				
3b	Non-U.S. facilities	PFOA, PFOA salts and higher homologues				
		Precursors				
3c	Please provide information on the methods, assumptions, uncertainties and detection limits for the data provided above.					

SECTION 4: SUMMARY OF PRODUCT CONTENT									
Reporting Period (use calendar year - e.g. Jan 1, 2005 to Dec 31, 2005)									
4a	Product type		Fluoropolymer dispersions		Other fluoropolymers[1]		Telomer based products		
	Production volume (kgs/year)[2]								
4b	Operations	Chemical category	Concentration[3]			% Reduction from baseline year			
			Fluoropolymer dispersions[4] (ppm wet-weight)	Other fluoropolymers[1,5] (ppb dry weight)	Telomer based products[6] (ppb dry weight)	Fluoropolymer dispersions	Other fluoropolymers[1]	Telomer based products	
	U.S. facilities	PFOA, PFOA salts and higher homologues							
		Precursors							
4c	Non-U.S. facilities	PFOA, PFOA salts and higher homologues							
		Precursors							
4d	Please provide information on the methods, assumptions, uncertainties and detection limits for the data provided above.								

[1] Fluoropolymers manufactured with PFOA or related chemicals.
[2] Use the following ranges: (1) Zero (2) > 0 – 10 kgs; (3) > 10 kgs – 100 kgs; (4) > 100 kgs – 1,000 kgs; (5) > 1,000 kgs – 10,000 kgs; (6) > 10,000 kgs – 100,000 kgs; (7) > 100,000 kgs – 1,000,000 kgs; (8) Over 1,000,000 kgs.
[3] Concentration should reflect the concentration of chemical in the product as sold by the reporting company. If the reporting company has information concerning the concentration of chemical in the product as used by others – for example, as incorporated by dilution into a formulation – that additional information would also be helpful.
[4] This value should be expressed as a weighted average concentration and range.
[5] This value should be expressed as a maximum concentration.
[6] This value should be expressed as a simple (not weighted) average and range.