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EXECUTIVE COMMITTEE OF THE MULTILATERAL FUND FOR THE IMPLEMENTATION OF THE MONTREAL PROTOCOL Eighty-third Meeting Montreal, 27–31 May 2019

# 2019 CONSOLIDATED PROJECT COMPLETION REPORTS

### Background

1. The issue of outstanding project completion reports (PCRs) has been addressed by the Executive Committee at each of its meetings. At the 82<sup>nd</sup> meeting, the Committee *inter alia* urged bilateral and implementing agencies (IAs) to submit, at the 83<sup>rd</sup> meeting, PCRs for multi-year agreements (MYAs) and individual projects that were due, and if they were not going to submit them, to provide the reasons. The Committee also to urged lead and cooperating agencies to closely coordinate their work in finalizing their portion of PCRs to allow the lead implementing agency to submit the completed PCRs according to the schedule" (decision 82/42(b) and (c)).

2. Pursuant to decision 82/42(b) and (c), the Secretariat prepared a list of all outstanding PCRs, based on the information contained in the 2017 progress report, and sent it to bilateral and IAs in the planning communication on 24 January 2019.

3. The PCRs received prior to the deadline<sup>1</sup> are found in Annexes I and II, and the outstanding PCRs due to the  $83^{rd}$  meeting are listed in Annexes III to V, to the present document.

### **MYA PCRs received**

4. Of the 181 MYA completed, bilateral and IAs had submitted 164 PCRs, prior to the 83<sup>rd</sup> meeting, with an outstanding balance of 17 as shown in Table 1. The list of the 20 PCRs submitted after the 82<sup>nd</sup> meeting is attached in Annex I to the present report.

<sup>&</sup>lt;sup>1</sup> The eight weeks' deadline to submit PCRs was 1 April 2019, but PCRs were accepted until 5 April 2019.

Pre-session documents of the Executive Committee of the Multilateral Fund for the Implementation of the Montreal Protocol are without prejudice to any decision that the Executive Committee might take following issuance of the document.

Lead agency	Completed	Received prior to the 82 <sup>nd</sup> meeting	Received after the 82 <sup>nd</sup> meeting	Outstanding
Canada	3	2	0	1
France	5	3	0	2
Germany	10	8	1	1
Japan	1	1	0	0
UNDP	33	21	11	1
UNEP	58	55	1	2
UNIDO	48	44	4	0
World Bank	23	10	3	10
Total	181	144	20	17

# **Table 1. Overview of MYAs PCRs**

5. An analysis of the aggregated funds disbursed, ODS phased out and delays in the completion of the 20 MYA PCRs is summarized in Table 2.

Table 2. Overview of the budget, ODS phased out and delay of MYAs submitted after the 82<sup>nd</sup> meeting

Lead agency	MYA funds (US\$)		ODP tonne	Average delay	
	Approved	Disbursed	Approved	Actual	(months)
Germany	5,025,860	5,025,860	1,914.7	1,802.1	44.00
UNDP	74,726,394	72,237,584	4,868.9	4,799.7	1.82
UNEP	2,618,342	2,392,050	40.0	40.0	23.00
UNIDO	57,767,991	50,280,609	318.7	312.8	6.25
World Bank	140,138,587	129,936,103	6,823.6	6,641.8	22.94
Total	280,277,174	259,872,206	13,965.9	13,596.4	19.60

### **Reasons for delays**

6. Project design and planning are frequent reasons for delays. These relate to administrative burden, such as the lengthy signing of a memorandum of understanding; and planning issues such as the time needed to identify an expert consultant, or the identification of beneficiaries for a chiller project.

7. Inadequate staffing at the Government level is another recurring reason for delay and affect directly the project activities at every stage. In one case the rotation of staff caused a five-year long vacancy for two positions within the project management unit (PMU). To address these issues, projects had to restructure or in one case a retired staff was hired as consultant to help with the transition. Broader structural changes in public institutions similarly affected timely project implementation. Political and governmental issues also cause delays that are outside the control of the national ozone unit (NOU) or of the IAs (e.g., the revision or update of standards, a change in the political direction of the ministries, the transfer of the NOU among different ministries, and the holding of elections and the subsequent changes of Government). One agency mentioned the tensions between three bordering countries, which strained the relations and slowed the discussion process and regional cooperation.

8. Funding-related issues relate, in one instance to project transfer from one agency to another, which required consultations of all the stakeholders to conclude the grant agreement, thus delaying the project; in other instance delays were because the lengthy administrative procedures and the disbursement of funds, as it was exemplified in one case late submission of a verification report delaying the approval of the subsequent tranche.

9. Delays due to the suppliers were attributed in two instances; one was because of the unavailability of the proper equipment; another to the competitive bidding process to purchase the refrigerant identifiers. Delays at the enterprise level were attributed to the lengthy process of eligibility of recipient enterprises due

to the complex nature of the project (i.e., different products and production processes). One agency mentioned that the market reluctance made some enterprises back out of the conversion process, leading to the return of funds, while another mentioned the enterprise's modernization and general upgrade of their manufacturing operations as the cause which delayed implementation.

#### Lessons learned<sup>2</sup>

10. Coordination, frequent communication and collaboration between all stakeholders (i.e., governmental agencies, IAs, industry associations and academia), from design to implementation, are vital for a successful implementation of projects and are repeatedly mentioned by the IAs and their national counterparts. A NOU specifically stressed the importance of a structured co-ordination in larger projects.

11. Lessons from effective project designs and implementation methods relate, *inter alia* to: an information gathering inception phase; a simple and flexible design; a design phase linking ongoing projects to the HCFC phase-out management plan (HPMP); and the consolidation of subprojects.

12. Project design should be subsequent to an information session in the preparatory stage (e.g., surveys, collection of technical information and technical level collaboration with potential beneficiaries), should be kept simple and allow for flexibility in its implementation as some elements may change (e.g., costs of equipment) between the inception phase and the implementation. In order to maintain an efficient implementation framework and to establish a thorough coordination between stakeholders, one project created a virtual organizational structure with standardized operational procedures, an innovative online knowledge sharing platform and an effective monitoring and review process, with regional focal points and thematic leaders. This process has been replicated in other countries, in different scopes, and is rated highly satisfactory by the stakeholders.

13. A plan that builds on ongoing projects, designed to create continuity with the HPMP, facilitates greatly its implementation. Agencies and their national counterparts reported the need to evaluate thoroughly the needs and realities of a given sector nationally before designing a project (e.g., by conducting surveys, verification reports and audits), to grasp the magnitude of the project and its regional distribution. One large country visited more than 2,100 enterprises on a four-year period and created a database to consolidate the findings of the different sectors and provide a good understanding of the country's CTC usage as a solvent and the alternatives used. Field-testing of the selected methodologies for implementation, prior to launch, are also recommended.

14. One agency praised the consolidation of subprojects in coordination with the large industrial sector, to overcome the inadequate management and technical capacity faced by the sector. However, limits of this approach, namely the long implementation period and the socio-economic and policy context in the country, have to be considered.

15. Other lessons were raised from successful projects on, *inter alia*: well-orchestrated trainings; public awareness strategies and access to information; commitment of stakeholders in relation to alternative technologies; the limited servicing capacities in dealing with flammable refrigerants; governmental commitment; and geo-political issues.

16. Training should be orchestrated to reach a multiplier effect at all levels (e.g., technicians of institutions, Government technical training institutes and industry), which should foster sustainability. In large countries, good training coordination is necessary to cover its geographically dispersed sectors. Most countries and agencies have mentioned the need to uphold institutional strengthening and capacity building,

<sup>&</sup>lt;sup>2</sup> Lessons learned from MYA PCRs can be found on the MYA PCR lessons learned database: <u>http://www.multilateralfund.org/myapcr/search.aspx</u>

particularly for customs officers and refrigeration technicians due to progressive changes in technologies and new regulations.

17. Public awareness is repeatedly mentioned as a crucial part of a successful project. One agency provided web access to online knowledge and learning materials to bridge the knowledge gap. In relation to import control, one custom administration implemented a "single-window" information management system for import/export controls, which integrated the ODS quota and licensing system to improve its process by making data management easier, faster and decentralized for all concerned parties including end-users.

18. In relation to availability of alternative technologies, the commitment of all stakeholders is crucial to surpass the challenges faced by the introduction of new technologies. The presence of local suppliers for alternatives to controlled substances and the additional benefits (i.e., energy efficiency) facilitates the end-users' confidence building in the alternatives and can foster additional investments.

19. A challenge was embodied by some countries facing limited servicing sector capacity to handle flammable refrigerants and a limited availability of ODS alternatives that are compatible with international standards of safety and energy efficiency, especially in smaller ODS consuming countries. A super-critical  $CO_2$  demonstration project, the first application of this technology in an Article 5 country, praised the successes it accomplished with the involvement of non-Article 5 country suppliers and experts that can be emulated by other Article 5 countries.

20. One Government's strong commitment to the projects helped them surmount the impediments it is facing from the country' economic and humanitarian crisis (shortages of almost all refrigerants and tools, price hikes, a come-back of the informal sector, the use of HCFCs and venting practices). This required the strengthening of the reclaiming and recycling practices, accessibility of tools and training from international experts. Geo-political issues have impeded cross-border dialogue on illegal trade between two neighboring countries.

21. Other lessons in facilitating effective projects were, *inter alia*: the technicians' appreciation of having the training in their own dialect, the need for a sustainability of staff; the possibility to successfully transfer technical know-how to the informal sector; greater accessibility to international expert at a lower cost; and the benefit of early assistance provided to enterprises for trainings and to establish a project team.

### Individual PCRs received

22. Of the total 1,855 investment projects that have been completed, bilateral and IAs had submitted 1,847 PCRs, with a balance of eight outstanding PCRs as shown in Table 3.

Agency	Completed	Received prior 82 <sup>nd</sup>	Received after the 82 <sup>nd</sup>	Outstanding
		meeting	meeting	
France	14	13	1	0
Germany	20	19	0	1
Italy	11	10	0	1
Japan	6	6	0	0
Spain	1	1	0	0
United Kingdom of Great Britain and Northern Ireland	1	1	0	0
United States of America	2	2	0	0
UNDP	895	894	0	1
UNIDO	448	448	0	0
World Bank	457	452	0	5
Total	1,855	1,846	1	8

Table 3. PCRs submitted for investment projects

23. Of the 1,193 non-investment projects<sup>3</sup> that have been completed, bilateral and IAs had submitted 1,157 PCRs, with a balance of 36 outstanding PCRs as shown in Table 4.

Agency	Completed	Received prior 82 <sup>nd</sup> meeting	Received after the 82 <sup>nd</sup> meeting	Outstanding
Canada	57	56	0	1
France	34	17	17	0
Germany	60	56	4	0
Italy	1	1	0	0
Japan	17	15	1	1
Portugal	1	0	0	1
UNDP	289	281	4	4
UNEP	460	435	2*	23
UNIDO	142	131	11	0
World Bank	42	36	0	6
Others <sup>4</sup>	90	90	0	0
Total	1,193	1,118	39	36

 Table 4. PCRs submitted for non-investment projects

\* In addition, UNEP submitted 18 individual PCRs for survey of ODS alternatives at the national level for which only one consolidated PCR is required.

24. The list of 40 investment and non-investment PCRs received after the 82<sup>nd</sup> meeting is contained in Annex II to the present document; the aggregated results relevant to disbursement, actual phase-out and delays are shown in Table 5.

Table 5. Overview of the budget, ODS phased out and delay of individual projects submitted after the 82<sup>nd</sup> meeting

	Number	Funds	Funds (US\$)		ODP tonnes phase out		Average delay (months)	
Agency	of projects	Approved	Disbursed	Approved	Actual	Duration	Delays	
France	18	2,476,488	2,292,410	71.7	53.7	87.93	59.91	
Italy	4	265,000	265,000	0	0	23.01	0.69	
Japan	1	900,000	900,000	0	0	65.97	35.50	
UNDP	4	1,021,743	967,166	0	0	27.41	6.09	
UNEP	2	232,200	190,040	0	0	71.05	49.28	
UNIDO	11	5,875,571	5,023,344	0	0	46.87	23.14	
Total	40	10,771,002	9,637,960	71.7	53.7	65.16	39.57	

#### **Reasons for delays**

25. ODS alternative surveys PCRs mentioned a series of delays that affected a high number of them, namely: the lack of available and qualified experts to conduct the surveys; the quality of the surveys undertaken by the consultant and the respect of the timeline; the lack of data or a discrepancy in the data reported among different actors; the lack of information recorded at the enterprises level and its poor quality; the lack of proper classification of the chemicals.

26. Other non-investment projects faced delays due to administrative and coordination processes; enterprise and beneficiary set-backs and unstable governmental and political situations. Administrative

<sup>&</sup>lt;sup>3</sup> Excluding project preparation, country programmes, multi-year projects, networking, clearing-house activities, and institutional strengthening projects.

<sup>&</sup>lt;sup>4</sup> Including PCRs completed and received from the following countries: Australia (25), Austria (1), Czech Republic (2), Denmark (1), Finland (5), Israel (2), Poland (1), South Africa (1), Spain (4), Sweden (5), Switzerland (3), and United States of America (40).

delays, such as the finalisation and signature of the financing agreement, higher implementation costs of the preparatory activities and the lengthy licensing and permit authorizations were also reported as impacting project implementation. In one large country facing both national and regional regulations and administration processes proved a burden.

27. Similarly, for ODS disposal and destruction projects, delays were related to the aggregation of the ODS waste on the regional level, the synchronization of the shipments from different countries, as well as finding synergies with persistent organic pollutant destruction activities, delayed projects due to obstacles in both legislation and institutional arrangements of the beneficiary countries.

28. Enterprise-related delays also impacted project implementation. In one non-investment project, no beneficiary enterprises wanted to host the recovery and recycling (R&R) centers, while the beneficiary of the only investment project PCR submitted was not satisfied by the equipment suppliers' offers. Therefore, addressing the lack of awareness of project benefits among stakeholders could avoid such issues.

29. As for the MYAs, Government related-delays referred mainly to the rotation of staff, political change in the country, unfavourable political situation, unrest and war.

# Lessons learned<sup>5</sup>

### ODS alternative surveys

30. Given the large amount of projects included in the consolidated PCRs submitted for ODS alternative surveys and following the reasons for delays listed above, a summary of the lessons learned from these projects is found below and relate, *inter alia*, to: information gathering and the quality of the data; policy, legislations and standards; awareness raising and communication; alternative technology; and institutional and capacity building.

31. The availability and quality of data have been the most recurring lessons from ODS alternative surveys and are due to a wide array of reasons, mainly to the flawed methods and non-mandatory collection, recording and archiving of data. To overcome these barriers, the following recommendations were provided:

- Implementing a licensing system, standards and harmonized system (HS) codes or a similar identification system for HFCs and their blends;
- Mandatory and systematic record keeping of all controlled substances (including HFCs) providing the required information by substance and by application. Preferably an online information system that could collect and report the data from importers to the NOU automatically, once it has been cleared by customs;
- Conducting individual meetings with end-users to ensure the quality of data;
- Combining a top-down and bottom-up approach to ensure the collection of quality data;
- Mandatory training and certification of technicians; and
- Establish internal committees for review and to update the information obtained in the surveys.

32. The need to address policies and legislation for HFCs has been stressed as it impacts the possibility to have streamlined data on ODS alternatives when regulations on the control of ODS do not include the import and export of non-ODS.

<sup>&</sup>lt;sup>5</sup> Lessons learned from the individual PCRs can be found in the PCR lessons learned database: <u>http://www.multilateralfund.org/pcrindividual/search.aspx</u>

33. Energy efficiency standards and labels in refrigeration and air-conditioning (RAC) imported by Article 5 countries are based on standards and labels from the exporting countries. Setting energy efficiency standards would result in significant energy and climate benefits.

34. Communication improvement and cooperation between the NOU and customs has been another recurrent lesson. The lack of tools, know-how and awareness of sectorial stakeholders and the public, especially for HFCs and low-GWP alternatives, impeded the projects leading to a general resistance amongst the technicians to adopt ODS alternatives. The ODS alternative surveys were an opportunity to generate awareness about the Montreal Protocol at the highest levels of the Government. The creation of a national refrigeration association is recommended to provide guidance, represent and promote the interests of to its member.

35. Technology-related issues related, *inter alia*, to: the higher costs of low-GWP and energy efficient technology acting as a market barrier and deterring end-users from servicing their RAC equipment; and the lack of recycling and destruction facilities to dispose of ODS. Capacity building of RAC technicians on ODS alternatives, in particular, relating to flammability issues is also necessary.

36. Lessons relating to institutional capacities mentioned the lack of experts at the national level and the need for the NOU to be in charge of the whole process to strengthen its capacity and its sustainability. One agency mentioned the need to establish operational linkages with other sustainable development goals.

# Verification reports

37. One PCR for verification reports praised the NOU's insistence to conduct two verification exercises during the project life-span, ensuring the country's successful controls on HCFC imports/exports before the final verification. Another verification report highlighted the fact that a large number of HCFC-22-based equipment was entering the country, which could potentially create problems for future servicing of the same equipment when the supplies will be limited.

# <u>Chillers</u>

38. Chiller projects suggested to: conduct inspection of the actual site and review all conditions involved in executing the project before starting the chiller replacement activities; create an inventory of existing chillers, which must be regularly updated; identify co-funding (e.g., local banking partners and elaboration of a fund-mobilization strategy at the national level) necessary to demonstrate sustainable and innovative mechanisms to facilitate the replacement of chillers.

39. Capacity-building efforts are vital to a successful chiller project: training staff ensures maximum benefits of the new equipment, while training investors in the technical analysis and modifications required facilitates chiller replacement. The experiences from the chiller projects and their impacts can be replicated in the phase-out of HCFCs and phase-down of HFCs, if funds for replacement of old equipment are made available to the end-users.

40. Adding a financial study to the feasibility project in addressing district cooling and creating a supervising committee overseeing implementation proved useful in assessing the financial feasibility of the systems and contributed to its credibility.

### ODS R&R networks; and disposal and destruction

41. Lessons from the implementation of an ODS R&R network project stressed the importance of: applying the project to the entire sector; assuring the servicing companies that they will retain their competitiveness; arranging for cheap or free and practical logistics to transportation and disposal of

recovered material that cannot be re-used on site; and guaranteeing the analysis and identification of the material recycled.

42. Demonstration projects for ODS disposal and destruction highlighted the need for better waste management controls (i.e., chemical waste definitions and identification, stakeholders' responsibilities, licensing and standards, reporting requirements, mandatory record keeping for servicing companies, R&R centres and firefighting equipment). Training on identification and handling of unwanted ODS need to take into account that waste-refrigerants and unwanted ODS banks stockpiled can contain important quantities of blended chemicals that cannot, or are complicated and costly, to be separated prior to destruction (e.g., according to an agency the destruction costs of an unknown waste mixture can be 25 to 30 per cent higher).

43. Local destruction facilities are preferred, but export is a viable option for countries that do not dispose of such facilities or when performances and environmental criteria are not guaranteed. To reduce costs, incentives to create multiple facilities in a country are recommended. The two technologies tested for ODS destruction demonstrated outstanding technical performance and environmental compliance; however, cement kiln was the most cost-effective and has a proven track record in handling other types of hazardous waste. However, provisions must be taken to ensure all facilities have a continuous emissions monitoring systems. In the country's argon plasma arc is a cutting-edge technology benefitting from a cleaner end-result, but have a higher cost than kilns and cannot import ODS for destruction, as hazardous waste imports are only allowed for recycling.

44. Adequate funding for demonstration of ODS destruction projects should consider costs associated with handling, transportation and dissemination activities. The mode of storage of the ODS waste (i.e., in several pressure cylinders at the point of origin) has an impact on the transport costs, which can be up to 30 per cent higher than the scenario of transporting once in a single container. In this regard, regional projects that provide an economy of scale and an environmental fund, can be an efficient financial mechanism for the collection, transport, aggregation and destruction of waste mixtures and provide a sustainable incentive to recover ODS waste by subsidizing the fee that the waste management facility pays to individual collectors.

45. One project demonstrated that the status of voluntary carbon markets prevents carbon revenue generation, regardless of the amount of ODS waste to be disposed. A revised implementation plan is looking into the most cost-efficient way of managing the ODS waste collected while paying attention to the interests of the country when it comes to aligning their ODS waste management practices and procedures with those in the European Union.

46. The informal sector should be controlled as it brings its share of setbacks: collectors removed components to sell (i.e., compressors, motors, metals such as copper wires and pipes) which contributes to the very small amounts of refrigerant left in obsolete appliances and vehicles. This contributes to the issue of a much lower availability of ODS waste than estimated, leading to a re-design of the disposal strategy.

47. Scheduled environmental inspections and training of environment inspectors to review equipment logbooks should be encouraged. Environmental taxes on refrigerants contributing to ozone layer depletion and climate change might feed environmental funds to finance the sustainable disposal of refrigerant waste.

48. The promotion low-GWP refrigerants in air-conditioning for high-ambient temperatures (HAT) found potential alternatives that have cooling capacities and energy efficiency performances close (and even better) to the baseline refrigerants, which, with further engineering, can be strong alternatives to replace HCFC-22. Local air-conditioning industries in HAT countries need improvement in the research and development capacity in re-designing and optimising products using low-GWP alternatives with their specific characteristics, such as flammability, higher pressures, temperature glide, and excess discharge temperature. However, economic and technology transfer barriers such as intellectual property rights will continue to be an issue until international and regional markets stabilise and focus on a limited group of

alternative refrigerants. A well-organized approach is needed in addressing the fast progressing energy efficiency standards in conjunction with low-GWP alternatives in order to avoid promotion of higher-GWP alternatives that are presently commercially available. The global move towards HFCs in addition to energy efficiency pressure could provide an opportunity to expand the horizon for non-conventional district cooling plants.

#### **Outstanding MYA PCRs and PCRs**

49. The Secretariat appreciates the actions by some of the bilateral and IAs to address the backlog of outstanding PCRs.<sup>6</sup> The Secretariat stresses the issue of submission of PCRs for stage I of the HPMP to the bilateral and IAs, as these are mandatory for the approval of the second stage<sup>7</sup>.

#### RECOMMENDATION

50. The Executive Committee may wish:

- (a) To note the 2019 consolidated project completion report (PCR) contained in document UNEP/OzL.Pro/ExCom/83/12;
- (b) To urge bilateral and implementing agencies to submit, at the 84<sup>th</sup> meeting, PCRs for multi-year agreements (MYAs) and individual projects that were due, and if they were not going to submit them, to provide the reasons;
- (c) To urge lead and cooperating agencies to closely coordinate their work in finalizing their portion of PCRs to allow the lead implementing agency to submit the completed PCRs according to the schedule;
- (d) To urge bilateral and implementing agencies to enter clear, well written and thorough lessons when submitting their PCRs; and
- (e) To invite all those involved in the preparation and implementation of MYAs and individual projects to take into consideration the lessons learned from PCRs, if relevant, when preparing and implementing future projects.

<sup>&</sup>lt;sup>6</sup> The SMEO stressed once again at the Inter-agency coordination meeting (Montreal, 5-7 March 2019) the importance to submit all outstanding PCRs, noting that many projects have been completed several years ago, and that progress and financial reports on completed projects have to be submitted until the PCRs are submitted, which increases the workload of the Executive Committee, the IAs and the Secretariat.

<sup>&</sup>lt;sup>7</sup> Decision 81/29.

#### Annex I

# MYA PCRs RECEIVED

Country	Country MYA Sector		<b>Cooperating Agencies</b>
Angola	HCFC phase out plan (stage I)	UNDP	
Chile	HCFC phase out plan (stage I)	UNDP	UNEP
China	HCFC phase out plan (stage I) XPS Foam	UNIDO	Germany
China	Foam	World Bank	
China	Production CFC	World Bank	
China	Solvent	UNDP	
Dominican Republic	HCFC phase out plan (stage I)	UNDP	UNEP
Iran (Islamic Republic of)	HCFC phase out plan (stage I)	UNDP	UNEP/UNIDO/Germany
India	CFC phase-out plan – Refrigeration Servicing	Germany	Switzerland/UNDP/UNEP/ UNIDO
India	Accelerated production CFC	UNDP	World Bank
India	CTC phase out plan	World Bank	France/Germany/Japan/UNDP/ UNIDO
Nigeria	HCFC phase out plan (stage I)	UNDP	UNIDO
Oman	HCFC phase out plan (stage I)	UNIDO	UNEP
Pakistan	HCFC phase out plan (stage I)	UNIDO	UNEP
Panama	HCFC phase out plan (stage I)	UNDP	UNEP
Peru	HCFC phase out plan (stage I)	UNDP	UNEP
Philippines	HCFC phase out plan (stage I)	UNEP	UNIDO/Japan
Republic of Moldova	HCFC phase out plan (stage I)	UNDP	
Uruguay	HCFC phase out plan (stage I)	UNDP	UNEP
Venezuela (Bolivarian Republic of)	HCFC phase out plan (stage I)	UNIDO	

# Annex II

# **INDIVIDUAL PCRs RECEIVED**

Code	Agency	Project title		
		Strategy for disposal and destruction of ODS for five		
AFR/DES/68/TAS/41	France	low-volume-consuming Central African countries (Burundi, Cameroon,		
		Central African Republic, Congo and Guinea)		
AFR/RFF/48/DFM/36	France	Strategic demonstration project for accelerated conversion of CFC chillers		
	Trance	in 5 African Countries (Cameroon, Egypt, Namibia, Nigeria and Sudan)		
CAF/REF/34/TAS/10	France	Implementation of the RMP: development and implementation of a		
	Trunce	tax/incentive programme		
		Implementation of the RMP: monitoring the activities of the RMP project,		
CAF/REF/34/TAS/11	France	including registration of refrigeration service technicians, distributors and		
		importers of CFCs		
CAF/REF/34/TRA/08	France	Implementation of the RMP: training programme for customs officers		
		Implementation of the RMP: train the trainers programme for refrigeration		
CAF/REF/34/TRA/09	France	technicians in good management practices and a training programme to		
		address technicians in the informal sector		
LAO/REF/34/TAS/06	France	Implementation of the RMP: recovery and recycling, training and		
		demonstration project (complement)		
	Б	Implementation of the RMP: training of trainers in good refrigerant		
LAO/REF/34/1RA/03	France	management practices (phase I); national technicians training project		
	Energy	(phase II)		
LAU/REF/34/TRA/04	France	Implementation of the RMP: customs training programme		
LEB/REF/23/TAS/21	France	Implementation of an ODS recovery and recycling network		
LEB/REF/28/TAS/29	France	reduction of CEC omissions in contributed chillers		
		Implementation of the DMD, set up a national reasoning and reavaling		
MAG/REF/29/TAS/05	France	notwork		
		Inclusion of the DMD: training of norsennel in charge of control and		
MAG/REF/29/TRA/02	France	mapitering of imports of ODS		
		Implementation of the PMP: training of trainers and refrigeration		
MAG/REF/29/TRA/03	France	technicians in good service practices		
MAG/REE/47/TAS/12	France	Implementation of the RMP: recovery and recycling component		
MFX/DFS/63/DFM/155	France	Demonstration project for disposal of unwanted ODS		
MOR/RFF/23/TAS/17	France	Implementation of an ODS recovery and recycling network		
SYR/REF/29/INV/56	France	CFC emission reduction in central air conditioning		
LES/PHA/74/TAS/18	Germany	Verification report for stage L of HCFC phase-out management plan		
$\frac{DLS}{11} \frac{11}{11} 1$	Germany	Verification report for stage I of HCFC phase-out management plan		
NAM/PHA/74/TAS/21	Germany	Verification report for stage I of HCFC phase-out management plan		
ODS Surveys	Germany	Survey of ODS alternatives at the national level		
CPR/DES/67/DEM/521	Ianan	Pilot demonstration project on ODS waste management and disposal		
$\frac{\text{COS/PHA}/75/\text{TAS}/54}{\text{COS/PHA}/75/\text{TAS}/54}$	UNDP	Verification report for stage L of HCFC phase-out management plan		
DOM/REF/74/TAS/57	UNDP	Dominican Republic: Feasibility study for district cooling in Punta Cana		
MOL/PHA/73/TAS/30	UNDP	Verification report for HPMP stage I for Moldova		
ODS alternative surveys	UNDP	Survey of ODS alternatives at the national level		
	CIUDI	Demonstration of a regional strategy for ODS waste management and		
EURJDES/69/DEM/13	UNEP	disposal in the Europe and Central Asia region		
NEP/DES/59/TAS/27	UNEP	Technical Assistance/Support for destruction of confiscated ODS in Nepal		
ALB/PHA/71/TAS/27	UNIDO	Verification report for stage I of HCFC phase-out management plan		
1	51,120	Promoting low-global warming potential refrigerants for air-conditioning		
ASP/REF/69/DEM/57	UNIDO	sectors in high-ambient temperature countries in West Asia		
CPR/DES/67/DEM/520	UNIDO	Pilot demonstration project on ODS waste management and disposal		
ECU/PHA/77/TAS/66	UNIDO	Verification report for stage I of HCFC phase-out management plan		
EGY/REF/75/TAS/127	UNIDO	Feasibility study addressing district cooling		

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Code	Agency	Project title	
MDN/PHA/75/TAS/38	UNIDO	Verification report for stage I of HCFC phase-out management plan	
MEX/DES/63/DEM/154	UNIDO	Demonstration project for disposal of unwanted ODS	
NER/PHA/71/TAS/29	UNIDO	Verification report for stage I of HCFC phase-out management plan	
ODS alternative surveys	UNIDO	Survey of ODS alternatives at the national level	
TUR/DES/66/DEM/99	UNIDO	Demonstration project for disposal of unwanted ODS	
YUG/PHA/71/TAS/42	UNIDO	Verification report for stage I of HCFC phase-out management plan	

#### Annex III

# **OUTSTANDING INDIVIDUAL PCRs**

Country	Code	Lead agency and cooperating agency
Argentina	ARG/ARS/56/INV/159	World Bank
Argentina	ARG/REF/18/INV/39	World Bank
Asia and Pacific Region	ASP/REF/69/DEM/56	UNEP
Bahamas	BHA/PHA/71/TAS/19	UNEP
Barbados	BAR/PHA/75/TAS/25	UNEP
China	CPR/ARS/51/INV/447	World Bank
China	CPR/FOA/59/DEM/491	World Bank
China	CPR/PRO/69/TAS/531	World Bank
China	CPR/SOL/64/DEM/506	Japan
Costa Rica	COS/REF/76/DEM/55	UNDP
Ethiopia	ETH/PHA/75/TAS/25	UNEP
Gambia (the)	GAM/PHA/71/TAS/27	UNEP
Georgia	GEO/PHA/75/TAS/38	UNDP
Ghana	GHA/DES/63/DEM/33	UNDP
Global	GLO/REF/47/DEM/268	World Bank
Global	GLO/SEV/47/TAS/269	Portugal
Global	GLO/SEV/63/TAS/309	World Bank
Haiti	HAI/PHA/73/TAS/19	UNEP
India	IND/ARS/56/INV/424	Italy
India	IND/ARS/56/INV/423	UNDP
India	IND/ARS/56/TAS/425	UNEP
India	IND/HAL/34/INV/315	World Bank
Indonesia	IDS/ARS/56/TAS/184	World Bank
Jordan	JOR/FUM/29/INV/54	Germany
Jordan	JOR/PHA/38/INV/77	World Bank
Kuwait	KUW/REF/37/TAS/06	UNEP
Kuwait	KUW/REF/37/TRA/03	UNEP
Kuwait	KUW/REF/37/TRA/04	UNEP
Kyrgyzstan	KYR/PHA/77/TAS/38	UNDP
Latin American Region	LAC/SEV/51/TAS/38	Canada
Malawi	MLW/PHA/71/TAS/35	UNEP
Myanmar	MYA/PHA/73/TAS/16	UNEP
ODS alternative surveys	Survey of ODS alternatives at the national level	UNEP
ODS alternative surveys	Survey of ODS alternatives at the national level	World Bank
Rwanda	RWA/PHA/75/TAS/25	UNEP
Syria	SYR/REF/29/TRA/49	UNEP
Syrian Arab Republic	SYR/REF/29/TAS/51	UNEP
Syrian Arab Republic	SYR/REF/29/TRA/47	UNEP
Trinidad and Tobago	TRI/FUM/65/TAS/28	UNEP
Uganda	UGA/PHA/71/TAS/18	UNEP
Yemen	YEM/REF/37/TAS/16	UNEP
Yemen	YEM/REF/37/TAS/19	UNEP
Yemen	YEM/REF/37/TRA/17	UNEP
Yemen	YEM/REF/37/TRA/18	UNEP

#### Annex IV

Country	MYA Sector/Title	Lead agency and Cooperating agency
Bangladesh	HCFC phase out plan (stage I)	UNDP/UNEP
China	HCFC phase out plan (stage I)- Servicing sector, including enabling	UNEP/Japan
China	HCFC phase out plan (stage I)- National co-ordination	UNDP
Democratic Republic of the Congo (the)	HCFC phase out plan (stage I)	UNEP/UNDP
Egypt	Feasibility study addressing district cooling	UNEP
Thailand*	HCFC phase out plan (stage I)	World Bank/Japan
Yemen	ODS phase out plan	UNEP/UNIDO

# **OUTSTANDING PCRs BY DECISION**

\* The PCR for Thailand's HCFC phase out plan (stage I) was submitted after the deadline and will be assessed at the 84<sup>th</sup> meeting.

#### Annex V

#### **OUTSTANDING MYA PCRs**

Country	MYA Sector/Title	Lead agency and Cooperating agency
Argentina	Production CFC	World Bank
Bahamas	CFC phase out plan	World Bank
Bahrain	CFC phase out plan	UNEP/UNDP
Bolivia (Plurinational State of)	ODS phase out plan	Canada/UNDP
China	CFCs/CTC/Halon accelerated phase out plan	World Bank/United States
China	Halon	World Bank
China	Process agent (phase I)	World Bank
China	Process agent (phase II)	World Bank
India	Production CFC	World Bank
Iran (Islamic Republic of)*	CFC phase out plan - MAC R&R	France
Kuwait	ODS phase out plan	UNEP/UNIDO
Lao People's Democratic Republic*	CFC phase out plan	France
Lebanon	HCFC phase out plan (stage I)	UNDP
Philippines	CFC phase out plan	World Bank/Sweden/UNEP
Venezuela (Bolivarian Republic of)	Production CFC	World Bank
Viet Nam	Methyl bromide	World Bank
Yemen	Methyl bromide	Germany

\*The PCRs for the Islamic Republic of Iran (CFC phase out plan - MAC R&R) and Lao's People's Democratic Republic (CFC phase out plan) were submitted after the deadline and will be assessed at the 84<sup>th</sup> meeting.