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Executive Committee of
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Seventeenth Meeting
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OVERVIEW OF ISSUES IDENTIFIED DURING PROJECT REVIEW

INTRODUCTION

1. This document presents issues that were raised in the process of the Secretariat's review of documentation submitted to the Executive Committee for its consideration. The Fund Secretariat received 283 requests totaling US \$161.4 million for bilateral activities, work programme amendments, activities in country programmes, and investment projects. Due to the large number of requests, the Secretariat and the implementing agencies agreed that a preliminary review should be exercised by the Secretariat.

2. As a result of that review, the Secretariat has forwarded 193 activities valued at US \$98.9 million to the Executive Committee for its consideration. The projects and activities that were not put forward (Annex I to this document) were deferred on the basis that they exceeded the cost-effectiveness thresholds established at the 16th Meeting, did not meet established guidelines, and/or they raised policy issues. It should be recalled that the Executive Committee adopted cost-effectiveness thresholds at its 16th Meeting based on a project pipeline identified by the implementing agencies and an expected total amount of contributions for 1995 of US \$120 million.

3. The Overview Paper contains the following three sections:

Section I	Issues Raised During the Preliminary Review
Section II	Issues Raised During the Secretariat's Normal Review
Section III	Issues Related to Resource Allocation

SECTION I: ISSUES RAISED DURING THE PRELIMINARY REVIEW

4. During the preliminary review, the Secretariat identified issues relating to the calculation of cost effectiveness and the need for new guidelines. This section is subdivided into those two categories of issues.

Calculation of Cost Effectiveness

5. In reviewing the projects submitted to the Secretariat, the following issues were identified: how to calculate cost-effectiveness, how to treat requests for partial funding of total project costs, and how to treat requests for companies with exports to non-Article 5 countries or partial multinational corporation ownership.

6. The cost-effectiveness of a project is a simple mathematical expression of total incremental costs of a project, excluding cost of safety where applicable, divided by the amounts of ODP (ozone depleting potential) to be phased out. Therefore, cost-effectiveness is extremely sensitive to any variation in the cost and/or ODP consumption figures. Many project proposals have cost-effectiveness values on or just under the threshold limits. Consequently, small variations in such

factors as consumption, contingency costs, and chemical prices can make the difference between a project coming within, or exceeding, cost-effectiveness threshold limits.

Partial Funding of Total Project Costs

7. A number of projects with cost-effectiveness values above the cost-effectiveness thresholds have been submitted for 'partial funding' of the total project costs. In other words, the enterprise has offered to absorb a proportion of the incremental costs and only seeks funding for the remainder, which corresponds to a level which meets or approaches the cost-effectiveness threshold. This could provide advantages to larger enterprises and multinationals, which can afford to absorb some costs, and could disadvantage those which cannot.

8. *The Executive Committee should decide on the admissibility of partial funding.*

Multinational Ownership and Exports

9. The Executive Committee has adopted guidelines for the funding of projects with multinational corporation ownership and where the beneficiary enterprise exports its product to non-Article 5 countries. Those guidelines result in funding a proportion of the total project costs based on the proportion of multinational corporation ownership or exports to non-Article 5 countries. If the cost-effectiveness value is based on the amount of total project costs eligible for Fund support, enterprises with multinational corporation ownership and that export to non-Article 5 countries could have an advantage over indigenous enterprises and those enterprises that do not export to non-Article 5 countries. (This issue is similar to the partial funding issue).

10. *The Executive Committee should decide if the cost-effectiveness value of projects for enterprises with multinational corporation ownership and enterprises that export to non-Article 5 countries should be determined on the basis of the eligible amount of the grant (as adjusted for foreign ownership and exports) or on the basis of total project costs.*

Need for New Guidelines

11. Several requests were received that raise issues that require guidelines for a resolution. Those issues concern the renewal of institutional strengthening, requests for halon banking and requests for methyl bromide surveys.

Institutional Strengthening

12. Three requests for the extension of institutional strengthening activities for another 3-year period were received. Total expenditure for institutional strengthening to-date is US \$ 10 million for 50 countries. The implementation of these projects varies significantly. In some cases, reporting on implementation is inadequate. In other cases, progress in setting up national regulatory and policy frameworks seems slow, although this is intended to be one of the most important functions of national ozone units. Also, the Executive Committee may wish to consider

if institutional strengthening should be provided for very low ODS-consuming countries whose institutional strengthening costs may exceed the country's level of incremental costs.

13. The Executive Committee may wish to consider the basis for renewal of institutional strengthening projects. The Committee may also wish to consider a basis for funding institutional strengthening projects in very low ODS-consuming countries.

Halon Banking

14. The Halon Technical Options Committee has reviewed halon banking programmes and concluded *inter alia* that halon banking is not likely to be effective in the absence of a regulatory framework in the country concerned. Moreover, halon banking proposals were received for halon banks at a regional level, at a country level, and at an enterprise level. The two proposals received at the enterprise level both cost in excess of US \$3 million each. To be successful, halon banking requires a sufficiently large source of recycled halon. This is usually obtained from organizations which are disbanding their existing halon systems. Individual enterprises and small halon consuming countries may not have a sufficient number of such organizations for halon banking within the country to be viable.

15. The Executive Committee might consider guidelines for halons banking based on activities at a regional level and which could include requirements for a regulatory framework, in approving funds for halon banking proposals.

Methyl Bromide

16. Requests for surveys to assess methyl bromide consumption were received from several countries. The Executive Committee has already approved a request for a methyl bromide survey in China at a cost of US \$87,000. Providing surveys on a country-by-country basis could set a costly precedent, especially in advance of a decision by the Parties that methyl bromide is a controlled substance for Article 5 countries. A global project that surveys consumption in all Article 5 countries may be more cost-effective.

17. The Sub-Committee may wish to consider funding requests related to methyl bromide.

SECTION II: ISSUES RAISED DURING THE SECRETARIAT'S NORMAL REVIEW

18. During the Secretariat's normal review according to the established guidelines and procedures of the Executive Committee, issues were identified that are grouped into the following categories: general issues, aerosol sector issues, refrigeration sector issues, and issues concerning recovery and recycling.

General Issues

19. In reviewing the projects submitted to this meeting, the Secretariat identified the following general issues: consistency with country programmes, suspension of intersessional approvals for bilateral activities, process agents, replenishment of the Small Projects Approval Process, technology transfer, and Funding for Conversion of Recently Erected Plants.

Consistency with Country Programmes

20. It is becoming increasingly common for ODS consumption figures relating to project approval to be different from, and frequently higher than those reported in country programme data. This is occurring even in circumstances where the country programme has been submitted simultaneously with project proposals. In some projects, discrepancies of up to 100 per cent have occurred.

21. Noting that the validity of project consumption data has increased in importance with the use of cost-effectiveness thresholds, the Executive Committee might consider whether consistency between ODS consumption figures in the country programme and in project proposals should be a pre-requisite for their consideration.

22. Some project proposals are still being received from countries without country programmes. This practice was initiated in order to expedite project implementation in the early stages of the operation of the Multilateral Fund.

23. Noting that circumstances have now changed markedly and increased emphasis is being placed on the further development and use of country programmes as a planning tool, the Committee might consider whether it wishes to establish either from this meeting or from future meetings, that investment projects will not be considered in the absence of a country programme.

Intersessional Approval for Bilateral Activities

24. At the 16th Meeting of the Executive Committee, it was decided that in order to ensure proper operation of the new cost-effectiveness threshold systems, intersessional approval of projects would need to be suspended.

25. The Executive Committee may wish to consider whether this decision should apply to bilateral activities.

Process Agents

26. The first project proposal involving the phaseout of a process agent has been submitted to this Meeting. In its work arising from the Sixth Meeting of the Parties, the Technology and Economic Assessment Panel (TEAP) has suggested that the Parties might wish to consider whether controlled substances used as process agents qualify for emission reduction investments

within the existing guidelines of the Multilateral Fund. The issue is likely to be considered by the Seventh Meeting of the Parties in 1995.

27. *In view of the uncertainty concerning the eligibility of process agents, the Committee may wish to decide that projects involving process agents be deferred until the Parties decide this issue.*

Replenishment of the Small Project Approval Programme (SPAP)

28. The World Bank is presenting with its progress report a request for the extension of SPAP. The Bank also mentions that the SPAP process has been a success.

29. *The Executive Committee may wish to consider the extension of the SPAP programme in the light of its decisions at the 16th Meeting.*

Technology Transfer

30. The Executive Committee has approved the costs of technology transfer fees for several projects. Proposals are now being received that include requests for the costs for the same technology transfer fees, from the same supplier, for projects in the same country.

31. *The Executive Committee may wish to consider whether technology transfer fees should only be eligible as incremental costs for the first conversion project through which the technology is initially transferred, or should be negotiated to cover the entire sector in which conversion is to take place.*

Funding of Conversion of Recently Erected Plants

32. A number of projects request funding for converting CFC-based facilities which were either erected after the country concerned had signed the Montreal Protocol and/or after the country programme had been approved by the Executive Committee. Some of these facilities have been erected as recently as 1993-1994. Therefore, what is being requested under these projects is the costs of scrapping brand new plant and erecting another new plant.

33. *The Executive Committee may wish to look at the eligibility of these projects and their order of priority in the funding list.*

Aerosols Sector Operating Savings

34. It is generally accepted that overall, there are net incremental savings in the conversion of CFC aerosols propellants to hydrocarbon propellants (HAPs). Project proposals are now coming forward for funding the conversion of contract fillers that do not themselves realize operational savings from conversion.

35. As indicated in the Indicative List of Categories of Incremental Costs "any savings that will be gained at both the strategic and project levels during the transition process should be taken into account on a case-by-case basis, according to criteria decided by the Parties and as elaborated in the guidelines of the Executive Committee."

36. *The Executive Committee might wish to consider how to treat incremental operating savings accruing to a country when aerosol contract fillers convert to HAP use.*

Refrigeration Sector

37. Two issues were identified in the refrigeration sector: the conversion or replacement of intermediate goods in the mobile air-conditioning sub-sector and the safety standards for hydrocarbon technology in the domestic refrigeration sub-sector.

Conversion or Replacement of Intermediate Goods in the MAC Sub-sector

38. Project proposals are now being received for the conversion of specific components or sub-components which form part of an overall system, e.g., filter dryer receivers for automotive air-conditioners. These conversions do not phase out any ODS by themselves, but may be a necessary part of system conversion.

39. *The Executive Committee may wish to consider the eligibility of funding the conversion of small intermediate components whose costs could be passed on to downstream mobile MAC manufacturers. This would constitute double-counting should the latter request incremental costs from the Multilateral Fund.*

Safety Standards for Hydrocarbon Technology in the Domestic Refrigeration Sub-sector

40. Safety standards in the domestic refrigeration projects submitted to the 17th Meeting vary from project to project, country to country, even when the same technology is used. The result is wide variance in costs. The decision of the Committee to exclude safety costs in the calculation of cost-effectiveness of these projects has left a substantial cost component of project cost unaccounted for in the calculation. In some cases this component is over 70 per cent of the project capital costs. Such cost variance can create inequity between projects, sectors and countries.

41. *The Executive Committee may wish to request the development of guidelines based on an expert evaluation of safety costs associated with conversion to the new technologies for its consideration at its 18th Meeting. The Executive Committee may also wish to consider the merits of including safety costs in the calculation of cost-effectiveness thresholds in domestic refrigeration and revising the thresholds accordingly. (It should be noted that excluding safety costs in the domestic refrigeration sector introduces inequities since safety costs are not deducted from other sectors, for example the foam sector.)*

Savings in Recovery and Recycling Projects

42. It is generally understood that specific implementation of recovery and recycling measures results in the availability for resale of the recycled CFCs. This produces operational savings and should be deducted from the project proposal's incremental costs. However, many recovery and recycling projects are presented as demonstration projects and savings are not included. Also, the Executive Committee has not established a cost-effectiveness threshold for such activities.

43. *The Executive Committee might wish to consider whether operational savings based on estimates of the tonnage of CFCs recovered, should be taken into account in the presentation of recycling project proposals. The Executive Committee might also consider whether to establish a cost effectiveness threshold, based on quantities recovered, to provide a means for the comparative evaluation of such projects. The threshold could be waived for small-scale demonstration projects.*

SECTION III: ISSUES RELATED TO RESOURCE ALLOCATION

44. Resources may be allocated according to the special funding categories established at the 16th meeting and up to the amount of funds available at the time of the meeting. The allocation of funds according to special funding categories raises certain issues. After a discussion of this matter, Section III presents a discussion of the requests and the level of funding availability.

Special Funding Categories

45. At the Sixteenth Meeting, the Executive Committee reserved specific funding allocations for five separate categories of projects. While in some cases the definition of these categories is quite clear (for example, implementing agencies' work programmes and bilateral activities), for others, the definition can be open to interpretation. For example, requests were received to consider projects under the discretionary fund that significantly exceeded the sectoral cost-effectiveness threshold values by up to fifty-fold.

46. *The Executive Committee might consider clarifying these definitions so that projects where special funding requests have been made, can be treated equitably with those which might fall into the same category, but for which no special requests have been received. These clarifications may include:*

- *The applicability of cost-effectiveness thresholds to projects in the discretionary funding categories, such as recycling and halon banking;*
- *Whether it is intended that special attention be given to the halon fire-extinguisher subsector through the discretionary fund; and*
- *Definition of a low ODS consuming country/enterprise.*

Fund Availability

47. After discussion with the implementing agencies 90 projects valued at US \$62.5 million have been deferred until after the Seventeenth Meeting, so that policy guidance provided at the meeting can be taken into account and other issues satisfactorily resolved. Including agency support costs, the Executive Committee still has before it for its consideration 101 investment projects totaling US \$93.3 million and 91 work programme and bilateral activities totaling US \$5.6 million. The Secretariat has recommended approval of 127 projects and other activities amounting to US \$51.4 million.

48. At the time of preparation of this paper, US \$ 29 million is available for project approvals at the upcoming meeting of the Executive Committee. Should the Executive Committee approve all the submitted requests for funding, a shortfall in Fund resources would result amounting to US \$70 million. Should the Committee approve the Secretariat's recommendation, a shortfall of US \$22.1 million would result.

49. *The Project Review Sub-Committee may wish to consider a basis for allocation of the available limited funds.*

Projects with policy or other major issues which have not been subjected to full review

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Project title	ODS to be phased-out (ODP tonnes)	I. A.	Funds (US \$) requested	C.E. (US\$/kg)	Comments/issues
Argentina					
Foam					
Subsector: Flexible polyurethane					
Conversion to non CFC technology in the manufacture of flexible foam (slabstock) at Belmo Buenos Aires and Belmo San Luis	146.0	UNDP	\$902,000	6.17	The project does not meet the cost-effectiveness threshold. The calculation of cost-effectiveness is based in part on the amount of CFC already phased out.
Conversion to non-CFC technology in the manufacture of flexible foam (slabstock) at Nuvel Corp. S.A.	70.0	UNDP	\$429,000	6.12	The project does not meet the cost-effectiveness threshold. The calculation of cost-effectiveness is based in part on the amount of CFC already phased out. The amount of consumption used in the calculation of the cost-effectiveness value was also based on the year of the highest consumption instead of the average consumption of the preceding three years.
Conversion to non-CFC technology in the manufacture of flexible foam (slabstock) at Mentvil S.A.	18.5	UNDP	\$115,000	6.18	The project does not meet the cost-effectiveness criterion. Following discussion with UNDP, it was agreed to defer the project pending approval by the Executive Committee of a policy on small ODS consuming enterprises.
Elimination of the use of CFC's in the manufacture of sandwich panels and spray foams at Montisol Argentina S.A. and Art Nouveau Puntana, S.A.	35.5	UNDP	\$396,148	3.50	The project does not meet the cost-effectiveness criterion. The cost-effectiveness based on the total incremental project cost is US \$11.16/kg. The cost-effectiveness figure of US \$3.5/kg quoted in the project excludes "direct and indirect safety costs" amounting to 66% of the capital costs. Since the project is not within the domestic refrigeration sector the deduction of the safety costs is not eligible.
Subsector: Rigid polyurethane					
Elimination of the use of CFC's in the manufacture of display cabinets and polyurethane panels for cold stores at Disthel in Buenos Aires and San Luis plants	9.8	UNDP	\$302,000	30.80	Above cost effectiveness threshold value
Refrigeration					
Subsector: Commercial					
Elimination of the use of CFCs in the manufacture of display cabinets and polyurethane panels for cold stores at Market Costan	30.8	UNDP	\$620,400	9.00	Enterprise is producing both rigid PUR panels and display cabinets. CFC consumption in panel production is not separated from total consumption in order to determine the cost effectiveness of this component of production (threshold value for rigid PUF is 7.83 US\$/kg ODP). If cost effectiveness is determined separately, the values will exceed those approved by the Executive Committee. Cost effectiveness calculated on the basis of reduced CFC-11 consumption which was achieved in 1993.

Projects with policy or other major issues which have not been subjected to full review

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Project title	ODS to be phased-out (ODP tonnes)	I. A.	Funds (US \$) requested	C.E. (US\$/kg)	Comments/issues
Subsector: Domestic					
Elimination of CFCs in 2 manufacturing plants of domestic refrigerators at Piragua, S.A., Ciifea, and Piragua San Luis	61.0	World Bank	\$1,267,152	13.57	The Secretariat was informed by the Government of Argentina (in June 1994) that the installed capacity in Piragua company was 70,000 units in 1992. The installed capacity was increased up to 242,000 units recently, according to the project document. CFC phase out reported in the project document (61 MT) does not correspond to the actual CFC consumption calculated on the basis of reported production output and consumption per unit. Cost-effectiveness, when calculated on the basis of actual CFC consumption, will be above the established threshold. The eligibility of certain components of capital cost is questionable.
Elimination of CFCs in domestic refrigerator production plants in Aurora S.A.	53.0	World Bank	\$1,962,717	12.14	Cost effectiveness calculated on the basis of reduced CFC-11 consumption which was achieved in 1992. If calculated on the basis of the current consumption, the cost effectiveness value will be higher than the approved threshold. The enterprise is only 25 % nationally owned according to Argentina's Country Programme; however, the project document states that the enterprise is 100 % nationally owned. Costs associated with safety amount to 66.21 % of the total incremental capital cost.
Brazil					
Foam					
Subsector: Rigid polyurethane					
Substitution of CFC-11 by HCFC-141b in the manufacture of polyurethane foams at Recrusil SEA	201.0	World Bank	\$1,613,176	7.83	Partial funding. Grant amount calculated on the basis of multiplying amount of ODS consumed by sector threshold value. Contingency was applied to incremental operating costs. Cost of new polyol is disproportionately higher than the average for the region. Considerable technology upgrade.
Substitution of CFC-11 by HCFC-141b in the manufacture of polyurethane foams at Termolar, S.A.	8.1	World Bank	\$130,820	7.83	Partial funding. Above cost effectiveness threshold value. No historical data of consumption
Substitution of CFC-11 by HCFC-141b in the manufacture of polyurethane foams at Randon Implementos	14.5	World Bank	\$116,373	7.83	Partial funding. Above cost effectiveness threshold value. No historical data of consumption
Substitution of CFC-11 by HCFC-141b in the manufacture of polyurethane foams at M. Agostini, S.A.	11.0	World Bank	\$88,283	7.83	Partial funding. Above cost effectiveness threshold value. No historical data of consumption
Substitution of CFC-11 by HCFC-141b in the manufacture of polyurethane foams at Sao Rafael Ind. Com.	14.0	World Bank	\$112,361	7.83	Partial funding. Above cost effectiveness threshold value. No historical data of consumption

Projects with policy or other major issues which have not been subjected to full review

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Project title	ODS to be phased-out (ODP tonnes)	I. A.	Funds (US \$) requested	C.E. (US\$/kg)	Comments/issues
Project preparation					
Subsector: Project preparation					
Preparation of an investment project in a plant (Elgin) consuming 60 metric tons of TCA used as a degreasing agent in the production of compressors		UNIDO	\$15,000		Funds have been allocated in previous work programme
CFC recycling and halon bank					
Subsector: Halon bank					
Halon 1301 use reduction and bank management (phase II)		Canada	\$654,334		Issues: no halon ban, agreement to supply region is needed, link to Basel Convention premature, equipment not cost effective
Solvent					
Subsector: CFC-113					
Phase out of CFC-113 at DMG used in medical equipment parts cleaning	2.0	UNDP	\$38,000	19.00	Partial funding: full eligible incremental cost exceeds cost effectiveness threshold value. The only information on the new cleaning system is a "one-line" description and price (US \$ 97,000). There is no information to support the cost figure or to establish its reasonableness and no comparison between capabilities and capacity of the new system compared to the existing manual cold-cleaning operation. Proportion of production for export is not provided.
Elimination of CFC-113 from the precision cleaning and drying process at Brasimet	1.6	UNDP	\$30,400	19.00	Partial funding: full eligible incremental cost exceeds cost effectiveness threshold value
Subsector: CFC-113, TCA					
Phase out of CFC-113 and of MCF used in vapor degreasers to clean aircraft parts at Embraer <i>Local ownership (%) 82.3</i>	12.6	World Bank	\$346,959	19.73	Partial funding: full eligible incremental cost exceeds cost effectiveness threshold value. Guidance is needed on the treatment of foreign ownership and exports in cost-effectiveness calculations. The proportion of production for export is not provided. Retrofitting of existing equipment is proposed, however some equipment items need examination to confirm eligibility and to establish the reasonableness of costs.
Subsector: TCA					
Conversion of ODS cleaning processes from 1,1,1 TCA to aqueous cleaning and using trichlorethane at Elgin Maquinas, S.A. <i>Export component (%) 5.0</i>	6.0	UNIDO	\$276,765	38.40	Cost effectiveness is above threshold value when correct ODP of TCA is used. Correction of an apparent error in calculation of incremental operating savings would provide incremental savings which exceed capital costs.

Projects with policy or other major issues which have not been subjected to full review

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Project title	ODS to be phased-out (ODP tonnes)	I. A.	Funds (US \$) requested	C.E. (US\$/kg)	Comments/issues
Cameroon					
Training, technical assistance					
Subsector: Training					
Formation des techniciens dans le secteur de la refrigeration et de climatisation au Cameroun		France	\$40,000		Issue: Double counting, previous approval provided regarding training
China					
Halon					
Subsector: Fire extinguisher					
Halon 1211 fire extinguisher production conversion at Zhuzhou Fire Fighting Equipment Factory	600.0	World Bank	\$302,400	0.40	This proposal contravenes two provisions of the Executive Committee's decision at its 16th Meeting for funding projects in the halon fire extinguisher sub-sector.
Colombia					
Refrigeration					
Subsector: Commercial					
Elimination of CFCs 11 and 12 in the manufacture of unitary commercial refrigeration equipment at Industrias de Refrigeración Super Nórdico	3.7	UNDP	\$131,636	35.87	Cost effectiveness is above threshold established by the Executive Committee.
Subsector: Domestic					
Elimination of CFCs 11 and 12 in the manufacture of domestic refrigerators at Unilemk Ltd. (Challenger)	17.1	UNDP	\$166,000	9.74	Production of CFC-refrigerators started in Dec 1994. Company was aware of CFC phase out policy in Colombia. Issue on eligibility of conversion of new established CFC facilities for consideration by ExCom. Cost of charging equipment needs to be adjusted.
Costa Rica					
Refrigeration					
Subsector: Domestic					
Elimination of CFCs 11 and 12 in the Manufacture of Domestic Refrigerators at Atlas Eléctrica S.A.	50.0	UNDP	\$468,870	9.38	Current CFC consumption is 27.2 tonnes. Cost effectiveness is calculated on the basis of foregone consumption of CFC-11. Cost of project needs to be adjusted to reflect the baseline cost of foaming equipment for which retroactive financing is requested and also to eliminate contingency. Cost of prototyping and testing is exaggerated, and the cost for a recycling machine constitutes double counting as the Executive Committee already approved a project for recycling in Costa Rica.

Projects with policy or other major issues which have not been subjected to full review

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Project title	ODS to be phased-out (ODP tonnes)	I. A.	Funds (US \$) requested	C.E. (US\$/kg)	Comments/issues
Egypt					
Foam					
Subsector: General					
Conversion to CFC free technology in the manufacture of flexible molded PUF and integral skin foam at El Shabrawi	16.0	UNDP	\$250,000	15.62	Enterprise is producing both rigid PUF panels and various refrigeration equipment. Consumption of CFC in panel production is not separated from total consumption in order to determine the cost effectiveness of this part of the production. Safety costs were excluded from calculation of cost effectiveness. The Committee approved this exclusion for domestic refrigeration only. Thus, if safety costs are included, cost effectiveness of the project will be above the approved threshold values. Capital cost of project needs to be revised.
Project preparation					
Subsector: Project preparation					
Preparation of a project in the solvents sector		UNIDO	\$25,000		UNIDO is submitting three investment projects in this sector for consideration by this meeting. It is not clear whether the request is for retroactive funding or for future activities
CFC recycling and halon bank					
Subsector: Halon bank					
Halon banking and reclamation/recycling		UNDP	\$185,000		Project withdrawn
Refrigeration					
Subsector: Commercial					
Elimination of CFCs 11 and 12 in the manufacture of commercial refrigeration equipment at United Investment Corp. Inc.	49.0	UNDP	\$594,500	7.08	Enterprise is producing both rigid PUF panels and various refrigeration equipment. Consumption of CFC in panel production is not separated from total consumption in order to determine the cost effectiveness of this part of the production. Safety costs were excluded from calculation of cost effectiveness. The Committee approved this exclusion for domestic refrigeration only. Thus, if safety costs are included, cost effectiveness of the project will be above the approved threshold values. Capital cost of project needs to be revised.
Elimination of CFCs 11 and 12 in the manufacture of commercial refrigeration equipment at Refcat, Co. Inc.	26.9	UNDP	\$709,500	15.12	Enterprise is producing both rigid PUF panels and various refrigeration equipment. Consumption of CFC in panel production is not separated from total consumption in order to determine the cost effectiveness of this part of the production. Safety costs were excluded from calculation of cost effectiveness. The Committee approved this exclusion for domestic refrigeration only. Thus, if safety costs are included, cost effectiveness of the project will be above the approved threshold values. Capital cost of project needs to be revised.

Projects with policy or other major issues which have not been subjected to full review

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Project title	ODS to be phased-out (ODP tonnes)	I. A.	Funds (US \$) requested	C.E. (US\$/kg)	Comments/issues
Solvent					
Subsector: CFC-113					
Conversion of cleaning processes from CFC-113 to aqueous cleaning at Optica	1.0	UNIDO	\$25,677	25.50	Project does not meet cost-effectiveness threshold for CFC-113 subsector either with the incorrect ODP value used, or with the correct value.
Subsector: CFC-113, TCA					
Conversion of electronic cleaning processes from ODS solvents to non-ODS cleaning at three electronic companies (Benha Co. for Electronics Industry, A.I.O. Electronics Factory, Sakr Factory) <i>Export component (%) 5.0</i>	15.5	UNIDO	\$311,809	20.18	Incorrect ODP values for CFC-113 and TCA are used. Project does not meet cost-effectiveness requirements and will need to be re-formulated. Exports need to be taken into account.
Conversion of cleaning processes from CFC-113 and 1,1,1 TCA to semi-aqueous cleaning at Arab International Optronics <i>Local ownership (%) 51.0</i> <i>Export component (%) 20.0</i>	2.3	UNIDO	\$79,450	33.95	Guidance needed on treatment of foreign ownership and exports in cost-effectiveness calculations. Even when discounted for foreign ownership, cost-effectiveness exceeds threshold. Project will need to be re-formulated.
Ghana					
Survey of consumption of methyl bromide		UNDP	\$30,000		The Executive Committee has already approved a request for a methyl bromide survey in China at a cost of US \$87,000. Providing surveys on a country-by-country basis would be a costly precedent, especially in advance of a decision by the Parties that methyl bromide is a controlled substance for Article 5 countries. A global project that surveys consumption in all Article 5 countries may be more cost-effective.
India					
Halon					
Subsector: Fire extinguisher					
Conversion from halon 1211 to ABC dry chemical power (ABC-DCP) and carbon dioxide (CO2) in portable extinguishers at Real Value Appliances Ltd.	462.0	World Bank	\$788,600	1.80	This proposal does not provide for a sub-sector phase-out as required by the Committee's decision at its 16th Meeting for the halon fire extinguisher sub-sector and based on the Committee's decision concerning the determination of the level of consumption, the cost effectiveness of this project is far greater (US \$7.97/kg) than the threshold value (US \$1.48/kg).

Projects with policy or other major issues which have not been subjected to full review

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Project title	ODS to be phased-out (ODP tonnes)	I. A.	Funds (US \$) requested	C.E. (US\$/kg)	Comments/issues
Refrigeration					
Subsector: Domestic					
Conversion of manufacturing facilities from CFC-11 foaming agent to cyclopentane and from CFC-12 to HFC-134a refrigerant at BPL Refrigeration Ltd.	165.0	World Bank	\$2,993,000	13.75	The project is to replace both foaming and refrigerant systems of a three year old plant which was purchased in 1992 after India had ratified the Montreal Protocol with a new plant. Project cost does not meet cost effectiveness threshold. Exact CFC consumption is difficult to ascertain from information provided.
Small Project Approval (Replenishment)		World Bank	\$3,000,000		Decision by ExCom
Solvent					
Subsector: CFC-113					
Conversion to CFC-free processes in the surface treatment of watch components at Titan <i>Local ownership (%) 98.0</i> <i>Export component (%) 7.0</i>	14.6	World Bank	\$236,900	19.66	Partial funding, foreign ownership, exports: Full eligible incremental cost exceeds cost effectiveness threshold. Additionally, this is a complex project involving the substitution of a vibratory gold plating machine for a simple CFC-113 cleaning process. Major issues of incrementality, cost, capacity and technical upgrade need to be addressed. It is also unclear as to whether the ODS to be phased out is based on consumption planned for elimination under this proposal, previous consumption already eliminated, or future consumption based on increasing production rates.
Subsector: CFC-113, TCA					
Conversion of electronic cleaning processes from ODS solvents to no-clean and aqueous photoresist developing and stripping technologies at ITI Palakkad	17.1	UNIDO	\$389,592	22.78	ODP values for CFC-113 and TCA are not correct. The project does not meet the cost-effectiveness requirements and needs to be reformulated.
Conversion of electronic cleaning processes from ODS solvents to no-clean and hydrocarbon cleaning technologies at ERL - Bangalore <i>Export component (%) 3.0</i>	18.7	UNIDO	\$456,542	24.38	ODP values for CFC-113 and TCA are not correct. The project does not meet the cost-effectiveness requirements and needs to be reformulated.
Subsector: TCA					
Elimination of 1,1,1 TCA from the precision cleaning processes at Modi Xerox <i>Local ownership (%) 64.0</i>	6.1	World Bank	\$240,700	38.50	Partial funding: full eligible incremental cost exceeds cost effectiveness threshold value. Foreign ownership was included in calculation of cost effectiveness threshold value. Export component of production not specified. Very little information given on major cost items, e.g., precision cleaner US \$76,000, water purification equipment US \$432,000. Design and installation costs, which are locally incurred, are very high at over US \$110,000.

Projects with policy or other major issues which have not been subjected to full review

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Project title	ODS to be phased-out (ODP tonnes)	I. A.	Funds (US \$) requested	C.E. (US\$/kg)	Comments/issues
Indonesia					
Foam					
Subsector: Rigid polyurethane					
Phasing out ODS at P.T. Air Tech co. Ltd., Indonesia	30.2	UNIDO	\$445,325	14.76	The enterprise produces rigid PUR panels, cold stores, refrigeration plant and units. CFC phase-out from refrigeration operations is very small and represents only 5 per cent of total CFC phase-out. CFC consumption in rigid PUR panel production is not separated from total consumption in the calculation of the cost-effectiveness of this component of production. The threshold value for rigid PUR is US \$7.83/kg ODP. If cost-effectiveness were determined separately the values would exceed those approved by the Executive Committee.
Survey of production and consumption of methyl bromide		UNDP	\$130,000		The Executive Committee has already approved a request for a methyl bromide survey in China at a cost of US \$87,000. Providing surveys on a country-by-country basis would be a costly precedent, especially in advance of a decision by the Parties that methyl bromide is a controlled substance for Article 5 countries. A global project that surveys consumption in all Article 5 countries may be more cost-effective.
CFC recycling and halon bank					
Subsector: Halon bank					
Halon management and banking programme	972.0	UNDP	\$394,000		This proposal cannot be assessed in the absence of guidelines,. The two halon banking requests overlap each other and institutional strengthening, and they include ineligible costs.
Halon management banking programme: national reclamation and network of recycling centres	100.0	UNDP	\$239,148		This proposal cannot be assessed in the absence of guidelines,. The two halon banking requests overlap each other and institutional strengthening, and they include ineligible costs.
Refrigeration					
Subsector: Domestic					
Elimination of ODSs used in the production of household refrigerators at P.T. National Gobel (converting to HFC-134a and cyclopentane)	110.2	World Bank	\$1,562,000	13.76	Current CFC consumption is 100 tonnes. Cost effectiveness value is calculated on the basis of future CFC consumption (110.2 MT) and taking into account local ownership. If calculated on the basis of actual CFC consumption and disregarding foreign ownership, the cost-effectiveness will be above the established threshold. Current consumption is 100 MT based on 20% CFC reduced technology. Information on the baseline situation is not complete. Requested capital costs are very high and not justified. Costs need to be adjusted taking into account incremental costs approved by the Executive Committee for similar conversion projects. Project costs need to be revised also to reflect substantial modernization and upgrade.

Projects with policy or other major issues which have not been subjected to full review

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Project title	ODS to be phased-out (ODP tonnes)	I. A.	Funds (US \$) requested	C.E. (US\$/kg)	Comments/issues
Elimination of ODSs used in the production of household refrigerators at P.T. Topjaya Antariksa Electronics (converting to HFC-134a and HCFC-141b)	91.0	World Bank	\$1,290,000	13.76	Cost effectiveness value is calculated on the basis of future CFC consumption (91 MT). If calculated on the basis of actual CFC consumption, the cost-effectiveness value will be above the threshold. Current CFC consumption is 68.8 MT based on 30 per cent CFC reduced technology. Information on the baseline situation is not complete. Costs requested for production equipment need to be adjusted taking into account incremental costs approved by the Executive Committee for similar conversion projects. Costs requested for testing equipment and training are not justified.
Elimination of ODSs used in the production of Household Refrigerators at P.T. Sharp Yasonta	172.7	World Bank	\$2,081,000	13.76	Cost effectiveness value calculated on the basis of future CFC consumption (172.7 MT) applying future production output which exceeds about twofold current installed capacity. If calculated on the basis of actual CFC consumption, the cost-effectiveness value will be above the threshold. Current CFC consumption is 46 MT based on 20% CFC reduced technology. Information on the baseline situation is not complete. Requested capital costs cover establishing a new production line rather than conversion of existing equipment. Costs need to be adjusted taking into account incremental costs approved by the Executive Committee for similar conversion projects. Project costs need to be revised also to reflect substantial modernization and upgrades.
Solvent					
Subsector: TCA					
Conversion of metal cleaning processes from 1,1,1 TCA to aqueous cleaning at PT. Markindo Theco <i>Local ownership (%) 80.0</i>	2.2	World Bank	\$85,700	38.50	Partial funding: full eligible incremental cost exceeds cost effectiveness threshold value. Provision has not been made for non-Article 5 exports (12%). Cost items need evaluation, e.g., aqueous system cost is double that appearing in similar projects. No basis is provided for capital equipment cost estimates. The technical reviewer criticizes the very high energy demands of the new system, which are 36 times greater than baseline costs.
Conversion of metal cleaning processes from 1,1,1 TCA to aqueous cleaning at PT. Garuda	2.7	World Bank	\$105,900	38.50	Partial funding: full eligible incremental cost exceeds cost effectiveness threshold value. Several components have little detail to support substantial costs.
Conversion of metal cleaning processes from 1,1,1 TCA to aqueous cleaning at PT. INTI	1.0	World Bank	\$38,500	38.50	Partial funding: full eligible incremental cost exceeds cost effectiveness threshold value.
Kenya					
Project preparation					
Subsector: Project preparation					
Project preparation assistance		UNDP	\$17,000		Funds have been allocated in previous work programme

Projects with policy or other major issues which have not been subjected to full review

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Project title	ODS to be phased-out (ODP tonnes)	I. A.	Funds (US \$) requested	C.E. (US\$/kg)	Comments/issues
Refrigeration					
Subsector: Commercial					
Umbrella investment project for phasing out CFCs at 3 companies of Kenya Cold Storage Group	32.3	UNIDO	\$1,206,920	14.70	Double counting since the same project was approved at the 13th ExCom Meeting to convert to HCFC-141b. It was agreed with UNIDO that project should be reformulated and resubmitted.
Malaysia					
Aerosol					
Subsector: Hydrocarbon					
Conversion to CFC free technology in the production of aerosols at Aerotechnique, Power Cosmetics, Atacorp, Wei Liam, Ulyen, Hong Bee	45.0	UNDP	\$332,250	7.55	Above cost effectiveness threshold value
Tenco Industries Sdn., Bhd., aerosol conversion project	18.0	World Bank	\$215,117		Above cost effectiveness threshold value
Foam					
Subsector: General					
Elimination of CFCs in the manufacture of molded/integral skin PUF at 2 companies: Artright and Sze Chuan <i>Local ownership (%) 77.8</i>	12.5	UNDP	\$216,920	17.35	Cost effectiveness value above threshold value. Project for low ODS consuming enterprises, with annual consumption ranging from 4 tonnes to 11 tonnes. The project maybe be deferred pending adoption of a strategy for the phase out of ODS in small ODS consuming enterprises.
Subsector: Rigid polyurethane					
Elimination of CFCs in the manufacture of rigid polyurethane foam at 3 companies: Amstrad, Frank Chee, TM Cooling Technology	23.0	UNDP	\$381,000	16.57	This project proposal is for low-ODS consuming enterprises with annual consumption ranging from 4 tonnes to 11 tonnes. The cost-effectiveness is very poor and requests have been made for discretionary funding. The project may be deferred pending adoption of a strategy for the phaseout of ODS in small ODS consuming enterprises.
Elimination of CFC-11 in the manufacture of PU cold room insulation/truck containers panels at Transfreeze	11.4	World Bank	\$245,000	20.87	This project proposal is for low-ODS consuming enterprises with annual consumption ranging from 4 tonnes to 11 tonnes. The cost-effectiveness is very poor and requests have been made for discretionary funding. The project may be deferred pending adoption of a strategy for the phaseout of ODS in small ODS consuming enterprises.
Elimination of CFC-11 in the manufacture of polyurethane refrigerator panels at Penang Trading	10.5	World Bank	\$248,000	22.93	This project proposal is for low-ODS consuming enterprises with annual consumption ranging from 4 tonnes to 11 tonnes. The cost-effectiveness is very poor and requests have been made for discretionary funding. The project may be deferred pending adoption of a strategy for the phaseout of ODS in small ODS consuming enterprises.

Projects with policy or other major issues which have not been subjected to full review

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Project title	ODS to be phased-out (ODP tonnes)	I. A.	Funds (US \$) requested	C.E. (US\$/kg)	Comments/issues
Elimination of CFC-11 in the manufacture of polyurethane cold room insulation panels/truck container panels at Kejuruteaan Transfreeze Sdn., Bhd.	11.4	World Bank	\$381,000	16.57	This project proposal is for low-ODS consuming enterprises with annual consumption ranging from 4 tonnes to 11 tonnes. The cost-effectiveness is very poor and requests have been made for discretionary funding. The project may be deferred pending adoption of a strategy for the phaseout of ODS in small ODS consuming enterprises.
Survey of production and consumption of methyl bromide		UNDP	\$85,000		The Executive Committee has already approved a request for a methyl bromide survey in China at a cost of US \$87,000. Providing surveys on a country-by-country basis would be a costly precedent, especially in advance of a decision by the Parties that methyl bromide is a controlled substance for Article 5 countries. A global project that surveys consumption in all Article 5 countries may be more cost-effective.
Halon					
Subsector: Fire extinguisher					
Conversion of production of portable fire extinguishers at Eversafe		UNDP	\$402,998		Since the Malaysia country programme indicates that the cost of converting the halon fire extinguisher sub-sector would be US \$52 million, it seems that the phase-out of this one enterprise will not represent a sub-sector phase-out as required under the Committee's decision at its 16th Meeting for the fire extinguisher sub-sector. This proposal also raises serious cost issues such as the operating savings/costs based on a different conversion ratio of ABC powder to CO2 and the excessive overhead costs for extinguishers. Finally, the proposal includes a halon recovery machine which constitutes retroactive financing and double-counting since it has already been purchased and Malaysia has received Fund support for such machines for the entire country.
CFC recycling and halon bank					
Subsector: Halon bank					
Phase out of the use of halons at the Tenaga National Berhad (TNB)		UNDP	\$2,609,200		This proposal cannot be assessed in the absence of guidelines and should be assessed in the context of the Committee's approval of halon recovery machines for Malaysia (as applicable) and in consideration of the implications of halon banking at the enterprise level.
Phase out of the use of halons at Malaysia Telecommunications Co. (Telekom)		UNDP	\$3,672,000		This proposal cannot be assessed in the absence of guidelines and should be assessed in the context of the Committee's approval of halon recovery machines for Malaysia (as applicable) and in consideration of the implications of halon banking at the enterprise level.

Projects with policy or other major issues which have not been subjected to full review

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Project title	ODS to be phased-out (ODP tonnes)	I. A.	Funds (US \$) requested	C.E. (US\$/kg)	Comments/issues
Refrigeration					
Subsector: Domestic					
Elimination of CFCs 11 and 12 in the manufacture of domestic refrigerators at Sanyo domestic refrigeration	13.4	UNDP	\$256,264	17.55	Cost-effectiveness value exceeds the threshold value. Cost of replacement of old HP foam machine needs to be adjusted to reflect the baseline cost of foaming equipment. Cost of reliability test trials and leak detection equipment should be reduced by UNDP to be in line with conversion costs requested in other similar projects.
Solvent					
Subsector: TCA					
Conversion of metal cleaning process from 1,1,1 TCA to hydrocarbons at AE Technology Sdn. Bhd. <i>Local ownership (%) 30.0</i>	16.8	World Bank	\$58,600	3.39	Policy issues: foreign ownership in calculation of the cost effectiveness value. Several components have little detail to support substantial costs.
Conversion of correction fluid manufacturing process from 1,1,1 TCA to non-ODS solvent at Mondial Sdn. Bhd. <i>Local ownership (%) 30.0</i> <i>Export component (%) 62.0</i>	85.0	World Bank	\$326,900	3.84	Policy issues: foreign ownership and exports in the calculation of cost-effectiveness. These are both large projects for which smaller grants are sought due to foreign ownership and exports. There are substantial differences in baseline prices which have a major influence on incremental operating costs. There are questions on eligibility and cost of several capital items. No information provided on major capital components (e.g., replacement filling equipment: US \$490,830; building modification US \$100,000).
Conversion of correction fluid manufacturing process from 1,1,1 TCA to non-ODS solvent at Widetech <i>Local ownership (%) 92.0</i> <i>Export component (%) 30.0</i>	29.0	World Bank	\$607,720	20.35	Policy issues: foreign ownership and exports in the calculation of cost-effectiveness. These are both large projects for which smaller grants are sought due to foreign ownership and exports. There are substantial differences in baseline prices which have a major influence on incremental operating costs (US \$4.2 million for 4 years). There are questions on eligibility and cost of several capital items. No information provided on major capital components (e.g., replacement filling equipment: US \$490,830; building modification US \$100,000).
Nigeria					
Refrigeration					
Subsector: Domestic					
Investment project for phasing out CFCs at Thermocool Engineering Co. PLC	85.0	UNIDO	\$2,788,780	12.47	Safety related costs represent 73 % of capital costs. It raises the issue of approach chosen for conversion of Thermocool enterprise. Capital and operational costs need to be revised.

Projects with policy or other major issues which have not been subjected to full review

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Project title	ODS to be phased-out (ODP tonnes)	I. A.	Funds (US \$) requested	C.E. (US\$/kg)	Comments/issues
Peru					
CFC recycling and halon bank					
<i>Subsector: Halon bank</i>					
Halon banking and management		UNEP	\$20,000		Under country programme. Halons have not been imported since 1992 and total halons in the country about 3 tonnes
Philippines					
Foam					
<i>Subsector: Flexible polyurethane</i>					
Residual phaseout of CFCs in the manufacture of PUF foam at RGC Foam Group (Polyfoam/Uratex)	550.0	UNDP	\$1,550,000	2.82	Cost-effectiveness is calculated based on CFC-11 already phased out. The actual quantity of CFC to be phased out is 63 tonnes. Thus cost effectiveness is US \$24.6/kg. The project consumption data is inconsistent with data and use pattern of CFC-11 in the sector as reported in the Philippines country programme.
Refrigeration					
<i>Subsector: Commercial</i>					
Elimination of CFCs 11 and 12 in the manufacture of commercial refrigeration equipment at Askcon Refrigeration Industries Inc.	11.1	UNDP	\$502,014	30.83	Above cost effectiveness threshold value. Partial retroactive funding. Cost of vacuum pumps needs to be adjusted.

Projects with policy or other major issues which have not been subjected to full review

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Project title	ODS to be phased-out (ODP tonnes)	I. A.	Funds (US \$) requested	C.E. (US\$/kg)	Comments/issues
Subsector: Domestic					
Elimination of CFC-12 in the manufacture of household refrigerators in the Philippines (Umbrella project: Concepcion Industries, Sanyo Philippines, Philippine Appliance Corporation (Philacor), and Transunion Corporation)	92.0	World Bank	\$1,580,000		The umbrella project covers conversion from CFC-12 to HFC-134a for four domestic refrigeration companies. Cost-effectiveness is calculated for four companies all together considering the amounts already approved for foam components and the total ODP to be phased out across the two components (refrigerant and foam). Cost-effectiveness if calculated individually per company will be above the threshold for some companies. Conversion of insulation foam blowing operations for the same companies has been approved at the 9th Meeting of the Executive Committee at US \$3,990,000, subject to resolving the issues identified by the Secretariat and OORG review. The World Bank has reported that the implementation of the conversion to HCFC-141b at the four companies will result in phasing out 287 MT of CFC-11 in 1995. Disbursement will be retroactive. The World Bank did not report on resolution of issues as indicated in the decisions of the Executive Committee, including that related to costs of testing, training and equipment and expanding of existing capacity. Actual CFC-11 phase out as reported by the World Bank is 287 MT. Actual calculated CFC-12 phaseout is 63.1 MT. Cost-effectiveness of the umbrella project calculated on the basis of actual CFC phase-out for both refrigerant and foam blowing conversions, will be US \$15.25/kg ODP phased out, which is above the threshold value. Ineligible cost items are identified in the project document. Costs need to be adjusted. Information on the baseline situation is not complete.
Solvent					
Subsector: CFC-113, TCA					
Elimination of the use of CFC-113, 1,1,1 TCA and CFC-12 at SBII Corp. in the manufacture of special formulations for various industrial markets	10.3	UNDP	\$124,000	12.00	Double counting. Ineligible on grounds that product is an intermediate good. End users are funded for incremental operating cost arising from use of a more costly non-CFC solvent
Romania					
Refrigeration					
Subsector: Domestic					
Phasing out ODS at the domestic refrigeration factory Arctic S.A.	236.7	UNIDO	\$3,698,667	11.44	Project covers two-stage conversion from CFC-11 to HCFC-141b and cyclopentane. It was agreed that UNIDO will withdraw the project.
Swaziland					
Refrigeration					
Subsector: Domestic					
Phasing out ODS at the domestic refrigeration factory Master Fridge	180.0	UNIDO	\$3,257,950	6.85	Project covers two-stage conversion from CFC-11 to HCFC-141b and cyclopentane and from CFC-12 to HFC-134a and isobutane. It was agreed that UNIDO will withdraw the project.

Projects with policy or other major issues which have not been subjected to full review

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Project title	ODS to be phased-out (ODP tonnes)	I. A.	Funds (US \$) requested	C.E. (US\$/kg)	Comments/issues
Tunisia					
Project preparation					
<i>Subsector: Project preparation</i>					
Preparation of investment projects in the domestic refrigeration sector		UNIDO	\$15,000		Funds have been allocated in previous work programme
Preparation of investment projects in the aerosol sector		UNIDO	\$15,000		Funds have been allocated in previous work programme
Preparation of investment projects in the solvents sector		UNIDO	\$15,000		Funds have been allocated in previous work programme
Preparation of investment projects in the foam sector		UNIDO	\$15,000		Funds have been allocated in previous work programme
Turkey					
Foam					
<i>Subsector: General</i>					
Phasing out CFC-11 at Urosan Kimiga Sonayii A.S.	158.0	UNIDO	\$1,146,728	7.26	Although project cost-effectiveness is within the threshold limit, issues relating to the use of new technology ("Cardio technology") in the major component of the project are being resolved by the implementing agencies to facilitate its uniform application. It was agreed to defer the project pending the resolution of the issues which include capacity expansion and incremental operational cost calculation.
<i>Subsector: Rigid polyurethane</i>					
Conversion to CFC-free technology in the manufacture of rigid polyurethane foam insulation panels at Tek-iz Izolasyon ve Yapi Elemanlari Sanayii	177.0	World Bank	\$1,108,000	6.26	Cost-effectiveness exceeds threshold value. The calculation of cost-effectiveness was based on future consumption which is indicated in the project as "actual consumption and confirmed production orders." Calculation of cost-effectiveness based on the data for the preceding year gives cost-effectiveness of US \$9.1/kg which exceeds the threshold.
Refrigeration					
<i>Subsector: Domestic</i>					
Elimination of the use of CFCs in the manufacture of domestic refrigerators at Pekel <i>Local ownership (%) 46.0</i> <i>Export component (%) 50.0</i>	95.0	World Bank	\$736,700	1.78	Substantial technological upgrade. Cost effectiveness and operating costs are calculated using 100% CFC-foam, while the company has converted to 50%-reduced CFC foam. Cost-effectiveness is calculated on the basis of 46% local ownership and taking into account 50% export to non-Article 5 countries. No justifications are provided regarding high cost of foam line conversion. Information on baseline situation is not complete.

Projects with policy or other major issues which have not been subjected to full review

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Project title	ODS to be phased-out (ODP tonnes)	I. A.	Funds (US \$) requested	C.E. (US\$/kg)	Comments/issues
Uruguay					
Halon					
<i>Subsector: Fire extinguisher</i>					
Transfer of technology and conversion of production of halon 1211 fire extinguishers at Izeta López Fire Company	3.0	UNDP	\$25,000		The cost-effectiveness value for this proposal, US \$9.61/kg, exceeds the US \$1.48/kg threshold and the proposal should be considered within the context of a decision on a strategy for low halon-consuming countries.
Conversion of production of halon 1211 fire extinguishers at Tornay and Mori	3.0	UNDP	\$40,000		The cost-effectiveness value for this proposal, US \$13.33/kg, exceeds the US \$1.48/kg threshold and the proposal should be considered within the context of a decision on a strategy for low halon-consuming countries.
CFC recycling and halon bank					
<i>Subsector: Halon bank</i>					
Halon management and banking		UNDP	\$89,000		This proposal cannot be assessed in the absence of guidelines and a decision on a strategy for low halon-consuming countries.
Venezuela					
Foam					
<i>Subsector: Polystyrene and/or polyethylene</i>					
Elimination of use of CFC's in the production of polystyrene foam at Fandec	9.5	UNDP	\$660,516		Cost-effectiveness is above threshold value. Costs of capital items are high. Government is requesting discretionary funding for the project. The project may be deferred pending approval of phase-out strategy for small ODS consuming enterprises.
CFC recycling and halon bank					
<i>Subsector: Halon bank</i>					
Halon 1301 use reduction and bank management (Phase II)		Canada	\$392,737		Issues: no halon ban. Agreement to supply region is needed. Link to Basel Convention premature. Proposed equipment not cost effective
Refrigeration					
<i>Subsector: Domestic</i>					
Elimination of CFCs 11 and 12 in the Manufacture of Domestic Refrigerators at Muebles de Acero Eterna, C.A.	0.4	UNDP	\$140,723	370.32	Above cost effectiveness threshold value. Government requested to consider the project under the discretionary fund for small consuming enterprises