EXECUTIVE COMMITTEE OF
THE MULTILATERAL FUND FOR THE
IMPLEMENTATION OF THE MONTREAL PROTOCOL
Forty-fourth Meeting
Prague, 29 November-3 December 2004

COUNTRY PROGRAMME: SAO TOME AND PRINCIPE

This document consists of:

• Country Programme Evaluation Sheet (prepared by the Fund Secretariat)
• Comments and Recommendations of the Fund Secretariat
• Transmittal Letter from the Government of Sao Tome and Principe
• Country Programme Cover Sheet
• Country Programme (Executive Summary)
SAO TOME AND PRINCIPE COUNTRY PROGRAMME EVALUATION SHEET

*Ozone Office, Ministry of Natural Resources and the Environment*

### Status of ratification of the Vienna Convention and the Montreal Protocol

<table>
<thead>
<tr>
<th>Convention/Amendment</th>
<th>Signature</th>
<th>Ratification</th>
<th>Entry into</th>
</tr>
</thead>
<tbody>
<tr>
<td>Vienna Convention (1985)</td>
<td>19-Nov-01</td>
<td>17-Feb-02</td>
<td></td>
</tr>
<tr>
<td>Montreal Protocol (1987)</td>
<td>19-Nov-01</td>
<td>17-Feb-02</td>
<td></td>
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<tr>
<td>London Amendment (1990)</td>
<td>19-Nov-01</td>
<td>17-Feb-02</td>
<td></td>
</tr>
<tr>
<td>Copenhagen Amendment</td>
<td>19-Nov-01</td>
<td>17-Feb-02</td>
<td></td>
</tr>
<tr>
<td>Montreal Amendment (1997)</td>
<td>19-Nov-01</td>
<td>17-Feb-02</td>
<td></td>
</tr>
<tr>
<td>Beijing Amendment (1999)</td>
<td>19-Nov-01</td>
<td>17-Feb-02</td>
<td></td>
</tr>
</tbody>
</table>

### Production of controlled substances:
No controlled substances produced.

### Consumption of controlled substances (2003)

<table>
<thead>
<tr>
<th>Substance</th>
<th>CFC-11 (tonnes)</th>
<th>CFC-12 (tonnes)</th>
<th>CFC-113 (tonnes)</th>
<th>CFC-114 (tonnes)</th>
<th>CFC-115 (tonnes)</th>
<th>TOTAL (tonnes)</th>
<th>Halon 121 (tonnes)</th>
<th>Halon 130 (tonnes)</th>
<th>TOTAL (tonnes)</th>
<th>CTC (tonnes)</th>
<th>MCF (tonnes)</th>
<th>TOTAL (tonnes)</th>
<th>Me-Br (tonnes)</th>
</tr>
</thead>
<tbody>
<tr>
<td>ODS</td>
<td>4.6</td>
<td>4.6</td>
<td>4.6</td>
<td>4.6</td>
<td>4.6</td>
<td>4.6</td>
<td>4.6</td>
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<td>4.6</td>
<td>4.6</td>
<td>4.6</td>
<td>4.6</td>
<td>4.6</td>
</tr>
</tbody>
</table>

### Distribution of ODP by sector:

<table>
<thead>
<tr>
<th>Sector</th>
<th>CFC 100.0%</th>
<th>Halon</th>
<th>CTC and MCF</th>
<th>MB</th>
</tr>
</thead>
<tbody>
<tr>
<td>Consumption</td>
<td>0.0</td>
<td>0.0</td>
<td>0.0</td>
<td>0.0</td>
</tr>
<tr>
<td>Percent of total:</td>
<td>100.0%</td>
<td>0.0</td>
<td>0.0</td>
<td>0.0</td>
</tr>
</tbody>
</table>

### Country Programme

**Duration of country programme:** 6 years (2004-2010)

**ODS phase out target:** 50% reduction in CFC consumption by 2005; 85% reduction by 2007; complete phase-out by 2010

**Phase out priority area:** Refrigeration servicing sector

**Cost of activities in country** $315,000

**Strategy:**

The Government’s strategy will be based on establishing an import licensing system by early 2005 to control imports of ODSs and ODS-based equipment including a quota system; training of refrigeration servicing technicians in good servicing practices; and monitoring and control of illegal trade in ODS.
SECRETARIAT’S COMMENTS AND RECOMMENDATIONS

DESCRIPTION

1. According to the survey conducted in 2003 for preparation of the Sao Tome and Principe country programme/RMP, total CFC consumption was estimated at 4.6 ODP tonnes, used to service refrigeration equipment. The CFC baseline for Sao Tome and Principe is 4.7 ODP tonnes.

2. The Government of Sao Tome and Principe is proposing to establish legislation and a regulatory system to control imports of ODS and ODS-based equipment. The Government has established a National Commission on the Environment responsible for all issues related to the Montreal Protocol.

3. At its 38th Meeting, the Executive Committee approved the institutional strengthening project for Sao Tome and Principe for a one-year period. As a result, the Ozone Unit was established under the Ministry of Natural Resources and the Environment. The country programme includes a request for additional funding for this project (US $90,000 for a two-year period). The Secretariat’s comments and recommendations on this request are presented in document UNEP/OzL.Pro/ExCom/44/18.

4. The country programme also includes an RMP project proposal. The Government of Sao Tome and Principe is requesting a total of US $325,000 for the implementation of this project. The Secretariat’s comments and recommendations on this request are presented in document UNEP/OzL.Pro/ExCom/44/55.

SECRETARIAT’S COMMENTS

Issues related to compliance on the part of Sao Tome and Principe

5. The Secretariat reviewed the Sao Tome and Principe country programme plan in light of the report of the Implementation Committee at its 32nd Meeting, held in Geneva from 17 to 18 July 2004.

6. At its 32nd Meeting, the Implementation Committee noted that Sao Tome and Principe (among other Parties temporarily classified as operating under Article 5) had not reported any consumption data to the Ozone Secretariat and urged Sao Tome and Principe (among other Parties) to work together with the UNEP CAP and with other implementing agencies to report data as quickly as possible.

7. Subsequent to the 32nd Meeting of the Implementation Committee, the Government of Sao Tome and Principe reported outstanding ODS consumption data to the Ozone Secretariat under Article 7 of the Montreal Protocol.
8. The Secretariat noted that the Sao Tome and Principe country programme/RMP had been submitted with a letter signed by the Minister of Natural Resources and the Environment stating the Government’s commitment to achieve the 2005 and 2007 control limits on time.

SECRETARIAT’S RECOMMENDATIONS

9. The Fund Secretariat recommends approval of the Sao Tome and Principe country programme, noting that approval of the country programme does not denote approval of the projects identified therein or their funding levels. Approval of the Sao Tome and Principe country programme is without prejudice to any decisions that might be taken by the Parties following consideration by the Implementation Committee of the consumption data submitted under Article 7 by the Government of Sao Tome and Principe.

10. The Fund Secretariat also recommends that the Government of Sao Tome and Principe be requested to present information annually to the Executive Committee on progress being made in the implementation of the country programme, in accordance with the decision of the Executive Committee on implementation of country programmes (UNEP/OzL.Pro/ExCom/10/40, para. 135). Using the approved format, the initial report, covering the period 1 December 2004 to 31 December 2005, should be submitted to the Fund Secretariat no later than 1 May 2006.
Madame Le Secrétaire Exécutif du Fond Multilatéral,

Sao Tome et Principe a accédé à la Convention de Vienne, le Protocole de Montréal et tous ces annexes le 19 novembre 2001.

La consommation de Sao Tome et Principe étant inférieure à 0.03kg/habitant, notre pays est donc concerné par les dispositions du paragraphe 1 de l’Article 5 du Protocole.


Le Gouvernement de Sao Tome et Principe a approuvé l’ensemble des actions contenues dans le présent Programme de pays et le PGFF, et s’assurera que la mise en œuvre se fasse en accord avec les dispositions du Protocole de Montréal. Ils pourront ainsi être modifiés et soumis une nouvelle fois pour approbation du Comité Exécutif du Fonds Multilatéral si d’autres actions s’avéraient nécessaires dans le cadre du Protocole.

En attendant, nous espérons que le Comité Exécutif du Fonds Multilatéral approuvera le présent Programme de pays et le Plan de Gestion des Fluides Frigorigènes lors de sa 44ème Réunion, et financera les projets qui y sont contenus, à savoir :

- La formation des techniciens en bonnes pratiques de service (PNUE)
- La formation des agents douaniers (PNUE)
- Le programme d'assistance technique dans le secteur du Froid (PNUD)
- Le suivi de la Mise en Œuvre du PGFF (PNUE)

En ce qui concerne ce Programme de pays et PGFF, ils sont fondés sur la surveillance de la consommation des CFCs dans tous les secteurs et présentent la stratégie visée afin d'accélérer l'élimination des SAO. Ils comprennent également l'engagement de Sao Tome et Principe à élaborer et mettre en œuvre la législation et d'autres mesures nécessaires afin d'aboutir à l'élimination de l'utilisation des substances CFC dans le secteur du froid.

Le résultat du PGFF sera positif et permettra d'atteindre une réduction d'au moins 85% en 2007 des CFC et ne nécessitera pas d'avances de fonds complémentaires pour atteindre cette réduction. Le cas échéant, les importations seront limitées, en application du système de licence qui sera mis en place très bientôt, de façon à soutenir les activités du PGFF.

Le PGFF contient les données sur la consommation (par rapport au gel) actuelle et celles prévues pour les années à venir - 50% de réduction en 2005, 85% en 2007, élimination en 2010. Il contient également le calcul du volume de la réduction de consommation dans le secteur du froid nécessaire pour atteindre ces buts.

Les consommations en cours et pour le temps à venir dans tous les sous-secteurs, notamment dans le secteur informel, les petites et moyennes entreprises et les climatisateurs d'automobile sont aussi incluses dans le Programme de pays et le PGFF.

Le Programme de pays fait également mention de la provision adéquate pour le suivi, la procédure pour l'envoi des rapports d'activité et l'engagement du pays concernant l'envoi annuel des rapports d'activité dans le cadre du projet.

En restant à votre disposition pour toute information dont vous pourriez avoir besoin, veuillez agréer, Monsieur le Secrétaire Exécutif, nos salutations distinguées.

ARLINDO DE CEITA CARVALHO
(Ministre des Ressources Naturelles et de l'Environnement)
COUNTRY PROGRAMME COVER SHEET

COUNTRY: Sao Tome and Principe

LEAD NATIONAL AGENCY: Le Gabinete do Ambiante, Ministère des Ressources Naturelles et de l'Environnement

LEAD IMPLEMENTING AGENCY: UNEP

DATE RECEIVED: November 2004

PERIOD COVERED BY COUNTRY: January 2005- December 2007

PROGRAMME

1. PHASE OUT SCHEDULE

<table>
<thead>
<tr>
<th>SUBSTANCE</th>
<th>CURRENT CONSUMPTION (TONNES X ODP) 2003</th>
<th>PLANNED TOTAL CONSUMPTION UNTIL PHASE-OUT (TONNES X ODP) 2004-2010</th>
<th>PLANNED YEAR OF COMPLETE PHASE-OUT</th>
</tr>
</thead>
<tbody>
<tr>
<td>CFC-11</td>
<td>0.0</td>
<td>0.0</td>
<td>2010</td>
</tr>
<tr>
<td>CFC-12</td>
<td>4.56</td>
<td>10.06</td>
<td>2010</td>
</tr>
<tr>
<td>CFC-115</td>
<td>0.055</td>
<td>0</td>
<td>2010</td>
</tr>
<tr>
<td>R-406</td>
<td>0.027</td>
<td>0</td>
<td>2010</td>
</tr>
<tr>
<td>HALON-1211</td>
<td>0</td>
<td>0</td>
<td>2010</td>
</tr>
<tr>
<td>MeBr</td>
<td>0</td>
<td>0</td>
<td>2010</td>
</tr>
<tr>
<td>TOTAL</td>
<td>4.642</td>
<td>10.06</td>
<td></td>
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</table>
## 2.0 GOVERNMENT ACTION PLAN

<table>
<thead>
<tr>
<th>YEAR</th>
<th>DESCRIPTION OF ACTION</th>
<th>SECTOR</th>
<th>INTENDED EFFECT</th>
<th>ESTIMATED COST (US$)</th>
</tr>
</thead>
<tbody>
<tr>
<td>2005-2007</td>
<td>Public Awareness Campaign</td>
<td>All</td>
<td>Create Awareness</td>
<td></td>
</tr>
<tr>
<td>2005-2007</td>
<td>Strengthening institutional framework</td>
<td>All</td>
<td>Provide monitoring and co-ordination</td>
<td>40,000</td>
</tr>
<tr>
<td>2005 (6 months)</td>
<td>Establishment of monitoring system for ODS imports, uses and Introduction of import licensing system</td>
<td>All</td>
<td>Ensure compliance with Protocol</td>
<td>20,000</td>
</tr>
<tr>
<td>2005 (12 months)</td>
<td>Training of Customs Officers, Enactment of regulations and provision of incentives and penalties</td>
<td>All</td>
<td>To ensure compliance with Action Plan</td>
<td>45,000</td>
</tr>
<tr>
<td>2005-2006</td>
<td>Training of refrigeration engineers and technicians</td>
<td>Refrigeration</td>
<td>Ensure improved servicing and maintenance practices</td>
<td>55,000</td>
</tr>
<tr>
<td>2005-2007</td>
<td>Monitoring of RMP Activities</td>
<td></td>
<td>Ensure that all activities under RMP are implemented</td>
<td>20,000</td>
</tr>
<tr>
<td>2005-2006</td>
<td>Establish infrastructure for Recovery and Recycling of CFC-12 and MAC</td>
<td>Refrigeration</td>
<td>To ensure reduction in ODSs consumption.</td>
<td>110,000</td>
</tr>
</tbody>
</table>
Sao Tome & Principe
Country Programme (CP)
and Refrigerant Management Plan (RMP)

EXECUTIVE SUMMARY

General Information:

The Island Republic of Sao Tome & Principe is situated in the Atlantic Ocean, about 300 km west of Gabon, with an area of 1.001 sq km. Sao Tome & Principe have a population of 143,186 according to 2003 statistics. The density of population is 149.85 inhabitants per km² with a population increase of 2.19%. The GDP amounted to 61.7 Mio US$ in 2002 (estimate).

Administratively Sao Tome & Principe is divided in 7 districts.

The main agricultural products are: bananas, breadfruit, corn, tomatoes, onions, green peas and manioc. Industrial products are: cacao, copra, coffee and palm oil. Pig farming is dominant, but there are also cattle, sheep, goat and chicken farming. Traditional fishing is an important factor, industrial fishing is minimal.

The main imports comprise food products, petrol and investment goods. Main exports are cacao, copra and coffee.

Electricity consumption is low and households consume more energy than industry. Tourism is very limited with a total of only 7 hotels.

Country Programme:

Sao Tome & Principe joined the Montreal Protocol in 2001 and adopted all the amendments to the Protocol (London, Copenhagen, Montreal and Beijing). Thus Sao Tome & Principe is in compliance with the international legal instruments which are tied to the Protocol.

The Country Programme is a document which establishes the levels of consumption of ODS during the relevant years until a complete phase-out is achieved. Sao Tome & Principe do not produce ODS nor equipment containing ODS. However, they import ODS to guarantee the needs of the population.

In 2003, the consumption of ODS was 4.7 tonnes which corresponds to 0.049 kg per person per year. This consumption level is low which allowed Sao Tome & Principe to become eligible for financial and technical assistance from the Multilateral Fund on condition that the country develops a Country Programme (CP) and a Refrigerant Management Plan (RMP).

Industry is almost non existent. Fishing has been up to now a principal economic activity after agriculture and forestry. Over 3,000 tonnes of fish were caught in 2000. There is mainly traditional fishing. Industrial fishing has come to a standstill because the two main national companies have closed down due to disinterest of the State. The cold storage warehouses have been shut down as well, but there is a plan to re-open them again in the near future.
Sao Tome & Principe import also paint, adhesives, aerosols and some cosmetics which are products containing ODS. They have likewise imported methyl chloroform and methyl bromide. Halons are not used in fire extinguishers. All fire extinguishers are on the basis of CO2 or ABC powder.

The reported data in the CP show R-12, the main ODS, with a low level consumption compared to other Article 5 countries. Despite this favourable condition, the situation could deteriorate in the coming years due to the following reasons:

- Elimination of CFC-12 containing equipment
- Illegal trade difficult to control because Sao Tome & Principe is an island
- Off-shore Oil exploration in the near future.

If nothing is done in the near future, the recent discovery of oil in the Gulf of Guinea is likely to have a significant impact on the country’s economy thus also putting the country at high risk in eliminating ozone depleting substances.

Being a party to the Protocol and to all its amendments Sao Tome & Principe have committed themselves to comply with the requirements of the Protocol. They will take all the necessary actions to continually reduce ODS consumption thus adhering to the set goals to reduce CFC consumption to 85% by 2007 and complete phase-out by 2010.

**Refrigerant Management Plan:**

Sao Tome & Principe have developed a Country Programme and a Refrigerant Management Plan which will allow them to eliminate these substances in the refrigerant sector fast and effectively.

The refrigerant/air conditioning sector is the main area of ODS consumption. Substances include CFC-12, CFC-115, R-22, R-406A and R-502.

R-12 was most used in 2003 which represents 97% of total refrigerants. This substance is mainly used in household fridges and car air condition. The sub-sector of commercial refrigeration represents only a weak ODS consumption. Mainly used are R-502 and R-406A. The three supermarkets in the capital are equipped with cooling windows and cool storage areas which correspond to the normal standards of the Protocol using alternative substances such as R-113A, R-404A, R-407A, R-410A, R-507 and R-600A. The other shops are very small in size and do not sell frozen food or fresh products.

R-22 is currently used in the sub-sector of domestic air conditioning and particularly in embassies, banks and hotels. There is only one maintenance company which have equipment that recuperates R-134A.
The RMP contains the following parameters:

- Development of a licensing system for import and export of ODS
- Training for customs officers
- Training of refrigerant technicians focusing on good practices in repair, maintenance and installation of equipment
- Follow-up activities
- Creation of a learning/training centre for technicians.

Since Sao Tome & Principe is an island state, the training of customs officials should also be of interest to border control, coast guard and trade inspectors as well as the National Police.

In order to allow Sao Tome & Principe to comply with the requirements of the Protocol, UNEP and UNDP are asked for financial aid which would facilitate the development of the Country Programme and the Refrigerant Management Plan as well as to ensure the proper functioning of the National Ozone Unit which was created to coordinate all activities.