BULGARIAN DATA ACCOMPANYING REPORT

AIR QUALITY

The realization of the intensive monitoring program in Bulgaria was organized in 3 stationary areas. The stations are equipped with automatic devices collecting air quality parameters in real time. The following stations were determined:

- **Vitinia (0001)** - This area is situated in the western part of Middle Stara planina (the Balkan mountain), on the territory of Vitinia State forestry district. It is representative for the beech forests. The region is under the influence of local and regional pollution sources;
- **Staro Oriahovo (0002)** – It is situated in the eastern part of Stara planina, "Gorska baraka" area of the Staro Oriahovo State forestry station. The region is representative for oak forests. There are regional pollution sources;
- **Yundola (0003)** – This area is situated in the western part of the Rodopi mountains, in the "Starina" area, on the territory of the experimental training forest station Yundola of the University of Forestry /UF/. It is representative for coniferous forests and is far away from local pollution sources.

The monitoring activities in 2007 were prepared in compliance with the ICP Forests Manual and comprise the following activities:

- Assessment of ambient air quality – Air pollution concentrations are measured in every 1 hour. Data for automatically measured atmospheric pollutants - **SO_2, NO, NO_x, NO_2** and **O_3** were downloaded from automated stations every 14 days;
- Validation of the data

The technical problems with some of sensors lead to high % lack of data for NO and NO_2 (Vitinia, Staro Oriahovo and Yundola stations) and for SO2 (Yundola station). The present submission report for air quality is based on the following % of validated data:

- Vitinia (0001) – 97% for SO_2, 90% for NO_2 and 98% for O_3;
- Staro Oriahovo (0002) – 91.3% for SO_2, 92% for NO_2 and 98% for O_3;
- Yundola (0003) – 87% for SO_2, 78% for NO_2 and 90% for O_3.