Memorandum I

Ref: Transport Problems of the Dust which is withdrawn from the Multi- Cyclone-Units; Waste Water Disposal Installation 46/56

When the plants Boehlen V and Boehlen VI were planned, enlarging the waste-water-handling installation was deferred because it was intended to relieve the settling basins of the mud disposal by the dry withdrawal of the Multiclone dust.

The quality of the mud of installation 56 should be improved so that a substantial relief in the whole mud situation could be expected. Unfortunately the situation did not improve, as shown by the following table:

Date	Dust prod. ton/mo.	dry dust forwarded to Zeitz tons	%	wet dust removed tons	Mud-disposal installation m^3 per day
1941	4,000	-	-	4,000	370
June 1942	4,600	3600	13.0	4,000	370
July 1942	4,200	300	7.2	3,900	385
August "	5,250	510	9.7	4,740	426
Sept.1942	5,300	1150	21.7	4,150	400

As can be easily seen, due to a high production in 1942 the dust yield has increased 25%. During the month of September 22% of the dus could be withdrawn in a dry condition and forwarded to Zeitz. But on the whole the dust removal from installation 56 has increased 10-20% resulting in absolutely no improvement of the mud-disposal problem. The reason for the failure is due to the unsuitability of the Multi-clone-dust-transportation system and the irregular acceptance of the dust by the Zeitz factory.

As experienced during the last year the Multiclone-dust is mater highly difficult to handle which has very changeable properties. Sometimes it flows like water, sometimes caking like moist flour. Th- result is that the Redler-conveyors can be operated normally for a short period of time whereafter they are blocked and must be shut dow Since the present installation is without reserve the desired dry-dus extraction must be often replaced by the moist one. The installation was supposed to handle 10 tons dust per hour, but due to the above described difficulties the actual output is as low as 4.5 tons per ho Even if the installation could be continuously operated, the maximum output would be 3,300 tons of dust per month, i.e. 60% of the total dust production, excepting the dust which is employed for the final dephenolization of the waste water.

In order to secure a considerable relief and a complete utiliza- tion of the Multiclone dust the installation of a greatly improved dust-transportation system is necessary. The Redler-conveyors to be constructed must be wide enough and must have a large output.