The State of Wisconsin
WISCONSIN STATE BOARD OF HEALTH
INDUSTRIAL HYGIENE UNIT
STATE OFFICE BUILDING
1 WEST WILSON STREET
MADISON 2

PLAINTIFF'S EXHIBIT
K-1201

K-10 DUST SURVEY

Plant: Algoma Plywood & Veneer

Location: Algoma, Wisconsin

Date of Survey: December 1, 1948

Official Contacted: Mr. G. R. Mercer, Superintendent

The purpose of this study was to determine the effectiveness of local exhaust ventilation at the K-10 bagging operation.

Velometer tests of the exhaust hoods showed the average velocity of air entering the hood to be slightly more than 200 feet per minute. Observation of the movement of dust laden air during filling operations showed that practically all of the dust was being captured by the hood.

A considerable amount of dust was dispersed in the air of the bagging room by such practices as shaking of dusty bags during inspection for holes and cleaning of clothing by blowing off dust with a compressed air line.

Dust counts were made at the breathing zone of the operator at both bagging machines, and of the room air in the middle of the room. Results of the dust counts are listed in the following table.

Sample Number	Time	Description	Dust Count MPCF*
1	3:30 P.M.	Room air near bagging machines just before start of operations. No filling since 1:00 P.M.	1.6
2	3:35 P.M.	Breathing zone of operator at #1 bagger during operation.	3.3
3	3:40 P.M.	Breathing zone of operator at #2 bagger during operation. Shaking of empty bags just prior to this sample very likely contributed to the high dust count.	20.0
4	3:45 P.M.	Room air after bagging	9.0

*MPCF - Millions of particles per cubic foot of air

CONCLUSIONS

Dust counts taken at the breathing zone of the bagging operator and visual observation of flow of dusty air into the exhaust hoods indicate that the hoods are performing a very satisfactory job of controlling dust generated by the bagging operation.

It was observed that shaking of dusty bags and cleaning of workers' clothing by blowing off with compressed air generated large clouds of dust. The dust count of 20 million of sample No. 3 shows that such practices can very rapidly increase the dustiness of the room.

RECOMMENDATIONS

1. It is recommended that shaking and inspecting of empty bags be done directly in front of the dust collector hood.

2. The use of a compressed air hose in the bagging room should be prohibited if possible.

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