



REGIONE DEL VENETO



Wood's dust:
limits, measures
of primary prevention and
healthy surveillance



BOOKLET for WORKERS

Preface

Wood dust can cause cancer in the nasal cavities, an unusual illness. In addition, wood dust can provoke irritations of the skin and sometimes asthma and bronchitis. Employers must get rid of substances whose exposure is associated with the cancer risk. Since wood dust is not avoidable in the manufacturing process and closed and protected operations are not practicable, the employer must reduce wood dust to the lowest possible level. When there is hardwood dust present, more than 5 mg/cm are not to be found. This maximum has been imposed by a law which takes into account a European directive: the legislative decree NO 66/02. It integrates the legislative decree NO 626/94.

Hardwood is not classified according to its physical hardness, but its name refers to the botanic features. For instance, poplar and balsa are hardwood, while fir is softwood.

Hardwood		Softwood
Acero	Abete kauri	Abete
Ontano	Iroko	Cedro
Betulla	Rimu	Cipresso
Carpino	Palissandro	Larice
Hickory	Palissandro brasiliano	Abete rosso
Castagno	Ebano	Pino
Faggio	Mogano africano	Douglas
Frassino	Mansonia	Sequoia
Noce	Balsa	Tuia
Platano	Nyatoh	Tsuga
Pioppo	Afromosia	
Ciliegio	Meranti lamellare	
Quercia	Tek	
Salice	Frake bianco	
Tiglio	Ayous	
Olmo		

Tab. 1 Type of wood

HOW TO DEFEND OURSELVES AGAINST HARDWOOD DUST IN THE WORKPLACE

1. Separation of working areas

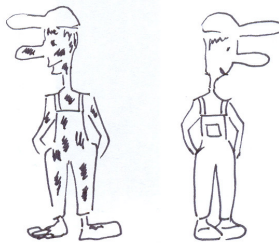
Dusty work must take place separately from Processes which do not cause dust, in order to avoid superfluous exposures.

With dust

cutting
smoothing/polishing
drilling
etc.

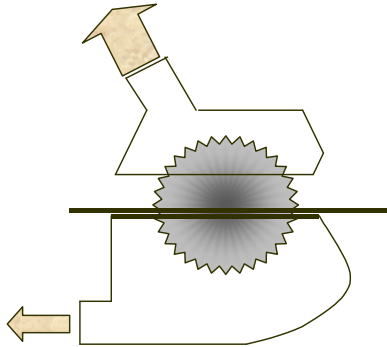
Without dust

finishing
assembling
storehouse



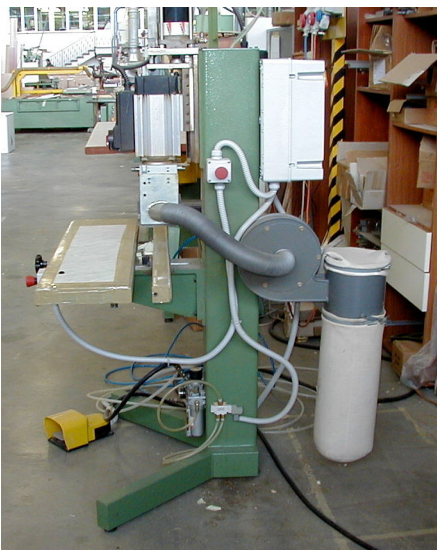
2. Dust suction

All machines and instruments which can produce wood dust, including manual ones, must be linked to the localized suction system



3. Gathering up and elimination of dust

Dust containers, as well as filter apparatus, must be set outside the workplace in order to avoid noise, vibration and dust.

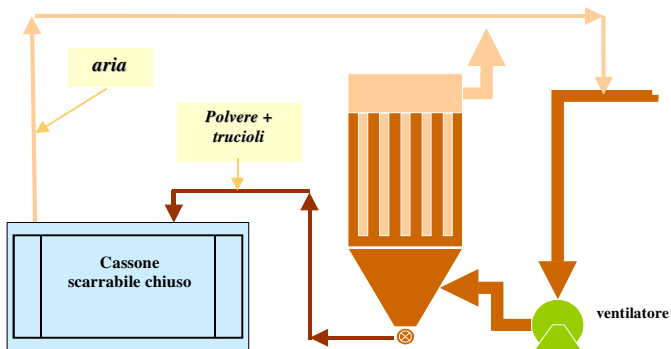


NO



NO

The gathering containers must be linked through specially provided containers, so that dust will not disperse in the air.



The sucked up air through the pumps is, after the separation of dust and wood chips, to be expelled from the working environment and not to be reused. The introduction of fresh air must give neither a cold sensation nor any draught.

HOW TO CLEAN THE WORKPLACE, THE MACHINES AND ONESELF

Streams of compressed air for cleaning are forbidden. Dust wood chips must be removed through special automatic sucking/suction systems, such as:

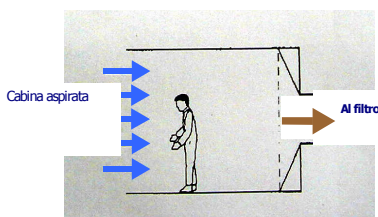
- industrial sucker or sweeper;
- installation of central cleaning apparatus.

During smoothing operations which are some of the most dusty works, worked pieces of wood must be cleaned through sucking brush.

The cleaning of clothes and shoes must be completed at the end of the work shift, before entering the dressing room. Special aspirating machines must be used, such as the sucking brush or the aspirating cabin.



Sucking brush



Aspirating cabin

Near the dressing room a special basket must be provided where work clothes will be put weekly and washed in the employer's care.

HOW TO PROTECT ONESELF IN PARTICULAR CONDITIONS OF WORK: INDIVIDUAL PROTECTION DEVICES

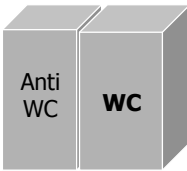


IPD (Individual protection devices) which must be used are both close texture cotton suits and masks for the protection of the respiratory tract. They must necessarily be used in the works of smoothing and sanding.

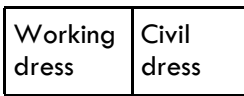
The use of IPD is particularly suggested during the operations of cleaning, maintenance and emptying of silos when a local aspiration system is not available. If splinters and chips are thrown all around, glasses must be worn too.

THE HYGENICAL SERVICE IN THE WORKPLACE

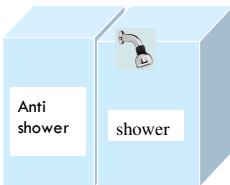
Sanitary services must be preferably set in vicinity of the workplace.



There must be one toilet for every ten workers.



One special room with separate lockers for the working clothes must be used as a dressing room



There must be at least one shower for every five workers.

