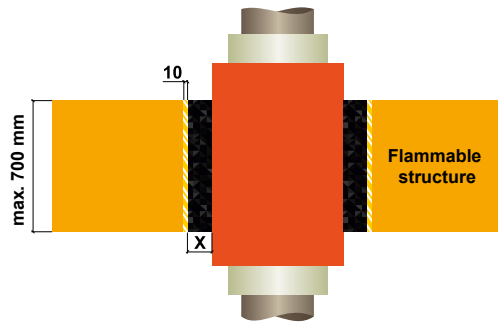


INSTRUCTIONS FOR THE INSTALLATION OF HELUZ SMART MASONRY CHIMNEY SYSTEMS IN CONSTRUCTIONS

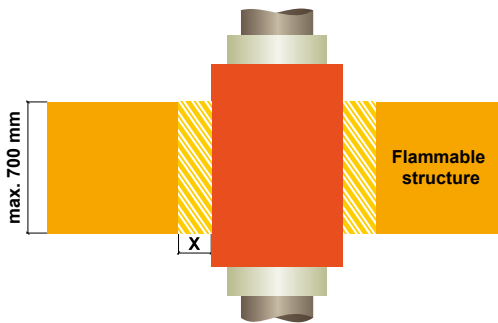
WITH RESPECT TO THE SAFE DISTANCE OF FLAMMABLE STRUCTURES FROM THE HELUZ CHIMNEY SHELL

CEILING PENETRATION



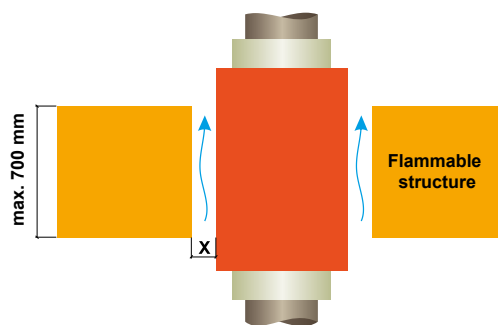
1. APPLICATION OF THE HELUZ STOPPER PENETRATION

Temperature class	X Safe distance	Description
T400	min. 30 mm GPH (thickness 50 mm)	HELUZ penetration + expansion joint separating the solid parts of the structure (the joint is filled with flexible thermal insulation material)



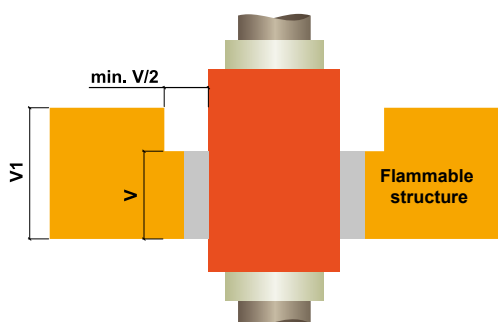
2. APPLICATION OF MINERAL INSULATION

Temperature class	X Safe distance	Description
T400	30 mm	The space between the chimney and the flammable structure is completely filled with mineral insulation. It is necessary to use solid board material for the complete height of the building. Laminated material should not be used (mineral insulation parameters: Lambda $\lambda \leq 0.04$ W/mK)



3. VENTILATION GAP

Temperature class	X Safe distance	Description
T400	30 mm	The air gap along the chimney periphery should not be covered

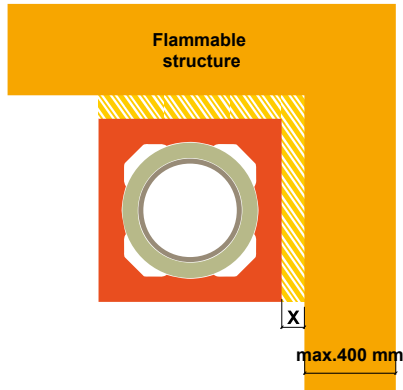


4. CONDITIONS FOR DETERMINING THE HEIGHT OF THE CEILING STRUCTURE

- If there is a reduced height "V" around the chimney, this height reduction must be at least within a distance of 1/2 of the reduced height "V" from the chimney shell. When the "V/2" distance cannot not maintained, it is necessary to consider the ceiling structure height "V1" (max. 700 mm).
- If the ceiling structure is inclined, the perpendicular distance with respect to the roof plane should be considered.

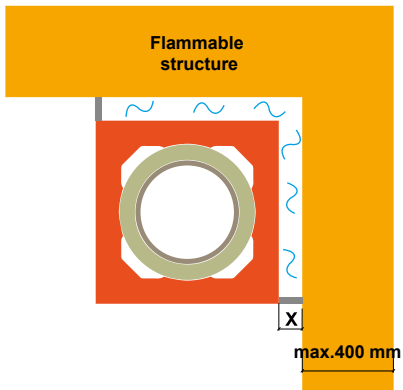
NOTE: It is possible to reduce the safe distance "X" to 0 mm for thermal class T200 and lower in all cases. If the ceiling structure height "V1" is higher, please consult HELUZ cihlářský průmysl a.s., 800 212 213 | info@heluz.cz, for an individual assessment according to the specific composition of the ceiling structure.

CONTACT WITH THE WALL



1. APPLICATION OF MINERAL INSULATION

X	Description
safe distance of flammable structures from the chimney shell Temperature class T400	
30 mm	The space between the chimney and the flammable structure is filled completely with mineral insulation. If the chimney is lined with plasterboard, it is necessary to use fireproof plasterboard (mineral insulation parameters: $\lambda \leq 0.04 \text{ W/mK}$)



2. ENCLOSED AIR GAP

X	Description
safe distance of flammable structures from the chimney shell Temperature class T400	
50 mm	Air gap enclosed with impermeable material (such as lining, strips, plaster, etc.) Air behind the chimney system does not flow. If the chimney is lined with plasterboard, it is necessary to use fireproof plasterboard

NOTE:

- It is possible to reduce the safe distance "X" to 0 mm for thermal class T200 and lower in all cases.
- The distance from flammable materials can be reduced if the size of the flammable material is low, e.g. in the case of skirting boards (see ČNS 73 4201).
We recommend consulting a fire safety engineer.
- PVC roof sheets can only be connected directly to the chimney body if: the roof sheet is flammability class "E" (rather than "F"); a complete part of the connected sheet is in direct contact with air in the exterior and neither overlaps nor is incorporated in any way; the chimney shell surface is treated in the connection place. The maximum height of the contact area of the sheet with the chimney shell is 300 mm. It is recommended to anchor the sheet to the chimney using brackets.
- The mentioned values apply to the wall thickness "S" up to 400 mm. If the wall thickness "S" is higher or if the ceiling structure height exceeds 700 mm, please contact HELUZ cihlářský průmysl a.s. for an individual assessment according to the specific composition of the ceiling structure. 800 212 213 | info@heluz.cz, for an individual assessment according to the specific composition of the ceiling structure.