

THERMOSENSITIVE VALVE AND SPRINKLER SYSTEM USING SAME

ABSTRACT

Provided is a thermosensitive valve in which it can be inhibited that the valve is cooled by water flowing while the valve is open and is thus closed and in which chattering can be inhibited from occurring; and also provided is a sprinkler system using the thermosensitive valve. A thermosensitive valve 1 is equipped with: a main water passage MW passing from an inlet port IP to a main outlet port MOP, where water flows in through the inlet port IP; a sub water passage SW branching off from the main water passage MW and passing to a sub outlet port SOP; a master valve 10 which opens and closes the main water passage MW; and a slave valve 20 which opens and closes the sub water passage SW. The master valve 10 has a master-valve opening/closing member 14 which opens and closes the main water passage MW in association with the opening and closing of the sub water passage SW. The slave valve 20 includes: a heat receiving member 30 which receives heat from an atmospheric temperature; a thermal expansion member 25 whose volume can be increased and decreased by heat transferred from the heat receiving member 30; and a slave-valve opening/closing member 22 which is driven by the increase and the decrease of the volume of the thermal expansion member 25 and thus opens and closes the sub water passage.

Fig. 1.