

ABSTRACT

A frost detecting device including a frost detector which detects the amount of frost from the temperature difference between a detecting thermal sensitive element and a compensating thermal sensitive element is provided. The frost detecting device includes: a frost detector 1 made up of a detecting thermal sensitive element and a compensating thermal sensitive element; an amplifier circuit 2 for amplifying an output signal from the frost detector 1; a comparator circuit 3 for comparing an output voltage from the amplifier circuit 2 with a set level; an operation detecting circuit 5 for detecting operating conditions of a compressor and a cooling fan 4; and a judging circuit 6 for detecting the amount of frost in accordance with output voltages from the operation detecting circuit 5 and the comparator circuit 3. The output from the comparator circuit 3 is used to detect the amount of frost only when the compressor and the cooling fan 4 are both in operation.