

DIK Developed alloy, HT series

Aluminium alloy with high thermal conductivity(Patented)

HT-1

1 High thermal conductivity

- High thermal conductivity (130~170W/(mK))
- Heat treatment can improve thermal conductivity

2 Good castability

- Good fluidity come from high Si content
- Less sticking to the die due to the effects of Fe

► Possible to cast suitable shape for heat radiation

Application examples

- Heat sink (LED lights, etc.)
- Water jacket for EV, etc.

HT-2

High thermal conductivity (over 180 W/(mK)) with no heat treatment

- HT-2 : Improve mechanical property due to adding Cu
- DIKHT-3 : Higher thermal conductivity than HT-2, High corrosion resistance

DIKHT-3

► Achieve higher level thermal conductivity

Application examples

- Mobile phone base station housing (HT-2)
- Gas cooktops parts (DIKHT-3)

Table Mechanical properties of HT series

Alloy name	Tensile Strength (MPa)	0.2% Proof Strength(MPa)	Elongation (%)
DIKHT-3	152	84	18.9
HT-2	180	85	14.3
HT-1	236	150	2
ADC12	354	184	3.4

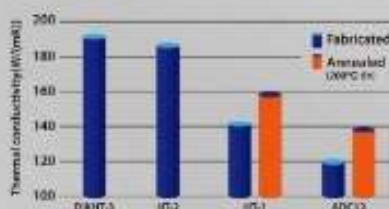


Fig. Thermal conductivity of HT series

Thermal conductivity
ADC12<HT-1<HT-2<DIKHT-3

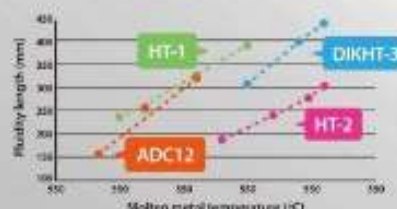


Fig. Molten metal Fluidity of HT series

Fluidity HT-2<DIKHT-3<HT-1≧ADC12

* The technical data in this document are based on our measurement, and are not guaranteed.



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<https://daikialuminium.com/>

