DATA=16 bits RH data+16 bits Temperature data+8 bits check-sum

Example: MCU has received 40 bits data from DHT11 as

0010 0001	0000 0000	0001 1010	0000 0000	0011 1011
Integral part of RH	Decimal part of RH	Integral part of T	Decimal part of T	check sum

Remarks: The decimal part of RH and T is always 0000 0000.

Here we convert integral part of RH from binary system to decimal system,

0010 0001   → 33

Binary system   Decimal system,   **RH=33%RH**

Here we convert integral part of T from binary system to decimal system,

0001 1010   → 26

Binary system   Decimal system, **T=26 Celsius**

Sum=0010 0001+0000 0000+0001 1010+0000 0000=0011 1011

Check-sum=the last 8 bits of Sum=0011 1011