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## **ADR**

Form PC-relative address adds an immediate value to the PC value to form a PC-relative address, and writes the result to the destination register.

31 30 29 28 27 26 25 24	23 22 21 20 19 18 17 16 15 14 13 12 11 10 9 8 7 6 5	4	3 2	1	0
0 immlp1 0 0 0 0	immhi			Rd	
op					

```
ADR <Xd>, <label>
integer d = UInt(Rd);
bits(64) imm;
imm = SignExtend(immhi:immlo, 64);
```

## **Assembler Symbols**

<Xd> Is the 64-bit name of the general-purpose destination

register, encoded in the "Rd" field.

offset from the address of this instruction, in the range

+/-1MB, is encoded in "immhi:immlo".

## **Operation**

```
bits(64) base = PC[];

X[d, 64] = base + imm;
```

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