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Simplex 4100 Configuration – Some notes

Wait passively for events to be sent from the panel.

These Map descriptors each capture event data from different Cards.

```
Map_Descriptors    ,

Map_Descriptor_Name, Data_Array_Name, Data_Array_Offset, Function      , Node_Name , sim4100_func, sim4100_card, sim4100_point, sim4100_sub, protocol, length,

Card 1 Msgs        , DA_C_001       , 1                , Passive_Client, Simplex_01, xpoint      , 1           , 0            , 3          , sim4100 , 300   ,

Card 2 Msgs        , DA_C_002       , 2                , Passive_Client, Simplex_01, xpoint      , 2           , 0            , 2          , sim4100 , 300   ,

Psuedo Point Msgs  , DA_C_128       , 4                , Passive_Client, Simplex_01, xpoint      , 128         , 0            , 1          , sim4100 , 200   ,
```

A single point can report 8 states. We store these 8 states as bits inside a storage word. The word can be served on BACnet (or Modbus) as a number or it can be unpacked into individual bits and served bit by bit.

For example. 1-0-0 reports an alarm. We store the value 1 in the word allocated for this point.

For example. 1-0-0 reports an trouble. We store the value 16 in the word allocated for this point.

Thus if 1-0-0 was in an alarm and trouble at the same time, we would store the value 17 = 1 + 16.

Bit Identifier Description

0 F Fire Alarm

1 P Priority 2

2 S Supervisory

3 T Trouble

4 U Utility

5 C Control

6 D Disable

7 A Primary state (based on point type - F if smoke detector, C if signal circuit, etc.)

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In the example

Bacnet Object AI(101) contains the number

```
CPS=1-0-0 State No , Server  , DA_C_001      , 0             , Virtual_Panel ,AI      ,
Present_Value,00101     , 1     ,No_Units
```

Bacnet Object BI(101) contains the alarm state. You can see the server map descriptor references DA_C_001b (a bit array). The bit array gets its data from a Move. The Move unpacks bits from the number values into individual bits.

```
CPS=1-0-0 Alarm    , Server  , DA_C_001b     , 0             , Virtual_Panel ,bI      ,
Present_Value,00101     , 1     ,Alarm       ,Normal
```

Each BACnet object must have a unique (Type,Object_ID) pair.