```
instr_addr_t  IP_CLASSIFY()
{  IP_protocol_t   wordx;

    //Lookup the destination address
    Dport = LOOKUPX(Da);

    //Read the TTL and Chksum fields
    wordx =  MEMX(LOAD, PP, TTL_WORD);
    TTL = wordx.TTL;
    Chksum = wordx.CHKSUM;
    TTL = TTL – 1;
    Chksum = Update_chksum(Chksum);
    switch (TTL == 0) {
      case OK: Next_step = NP_INSTR_EMIT;
      default: Next_Step =
                  NP_INSTR_EXCEPTION;
}
}
```