```
   // C[i] stores candidate nodes in loop level i
 1: C = array(PAT_SIZE, MAX_DEGREE);
   // Csize[i] is number of nodes in C[i]
 2: Csize = array(PAT_SIZE);
   // iter[i] is loop iterate in level i
 3: iter = array(PAT_SIZE);
 4: l = 0;   // start from loop level 0
 5: while (true) {
 6:   if (l < Q.size) {
        // if this subgraph has not been extended
 7:     if (Csize[l] == 0) {
          // extend it
 8:       getCandidates(G, Q, l, C, Csize);
          // algorithm stops if no subgraph can be extended
 9:       if (l == 0 && Csize[l] == 0) break;
10:       iter[l] = 0; }
        // if there are unexplored nodes
11:     if (iter[l] < Csize[l]) { l++; } // go to next level
12:     else { // if all candidates are explored
          // empty the candidate set
13:       Csize[l] = 0;
          // and backtrack to previous level
14:       if (l > 0) { l--; iter[l]++; } }
15:   } else { // output subgraph at last level
16:     Output(C, iter); l--; } }
```