Algorithm 1 The Bellman-Kalaba algorithm

1: **procedure** $\textsc{BellmanKalaba}(G,\ u,\ l,\ p)$
2:     **for all** $v \in V(G)$ **do**
3:         $l(v) \leftarrow \infty$
4:     **end for**
5:     $l(u) \leftarrow 0$
6:     **repeat**
7:         **for** $i \leftarrow 1, n$ **do**
8:             $min \leftarrow l(v_i)$
9:             **for** $j \leftarrow 1, n$ **do**
10:                 **if** $min > e(v_i, v_j) + l(v_j)$ **then**
11:                     $min \leftarrow e(v_i, v_j) + l(v_j)$
12:                     $p(i) \leftarrow v_j$
13:                 **end if**
14:             **end for**
15:             $l(i) \leftarrow min$
16:         **end for**
17:         $changed \leftarrow l \neq l$
18:         $l \leftarrow l$
19:     **until** $\neg changed$
20: **end procedure**

21: **procedure** $\textsc{FindPathBK}(v,\ u,\ p)$
22:     **if** $v = u$ **then**
23:         **Write** v
24:     **else**
25:         $w \leftarrow v$
26:         **while** $w \neq u$ **do**
27:             **Write** w
28:             $w \leftarrow p(w)$
29:         **end while**
30:     **end if**
31: **end procedure**