

1	2	3	4	5	6	7	8	9	10
---	---	---	---	---	---	---	---	---	----

Indices

3	4	3	3	-1	4	3	2	4	-1
---	---	---	---	----	---	---	---	---	----

I

Channel suggested for user 1

(b) Candidate parent solution for user 1 ( $m = 4$ )

1	4	3	3	-1	4	3	2	4	-1
---	---	---	---	----	---	---	---	---	----

$C_1$

2	4	3	3	-1	4	3	2	4	-1
---	---	---	---	----	---	---	---	---	----

$C_2$

3	4	3	3	-1	4	3	2	4	-1
---	---	---	---	----	---	---	---	---	----

$C_3$

4	4	3	3	-1	4	3	2	4	-1
---	---	---	---	----	---	---	---	---	----

$C_4$

(c) Mutation on position 1 to generate  $m = 4$  off-springs

2	4	3	3	-1	4	3	2	4	-1
---	---	---	---	----	---	---	---	---	----

Survivor

(d) Selection of the best off-spring as survivor (here, we assume  $C_2$  has the least fitness value among the four off-springs)