



## Simbionix RobotiX Mentor Evaluation Questionnaire

-Your responses will be processed anonymously-

### Section 1: General Demographics

Name: ..... Age: .....

Gender: M/F

Clinical Experience (please circle):

Trainee – stage of training:

|     |     |     |     |     |     |     |     |
|-----|-----|-----|-----|-----|-----|-----|-----|
| CT1 | CT2 | ST3 | ST4 | ST5 | ST6 | ST7 | ST8 |
|-----|-----|-----|-----|-----|-----|-----|-----|

Consultant – years of independent practice:

|     |     |     |      |       |       |     |
|-----|-----|-----|------|-------|-------|-----|
| 0-1 | 1-3 | 3-5 | 5-10 | 10-15 | 15-20 | >20 |
|-----|-----|-----|------|-------|-------|-----|

### Section 2: Previous Experience

Please indicate (**no. of times**) your experience for the following procedures:

| Procedures                                  | Observed | Assisted | Performed |
|---|----------|----------|-----------|
| Robotic-assisted prostatectomy              |          |          |           |
| Robotic-assisted nephrectomy (inc. partial) |          |          |           |
| Robotic-assisted cystectomy                 |          |          |           |

### Section 3: Technical Skills Training

1. Have you received formal training for robotic surgery? Y/N
2. Have you ever been assessed on your performance for robotic surgery? Y/N
3. Do you have simulation experience of robotic surgery? Y/N

4. Please indicate (tick) which methods of Simulation you previously used:

|  |  |  |  |               |  |                                |  |                                  |  |
|--|--|--|--|---------------|--|--------------------------------|--|----------------------------------|--|
| <b>Robotic Surgical Simulator (RoSS)</b> |  | <b>Simsurgery Educational Platform (SEP)</b> |  | <b>ProMIS</b> |  | <b>Mimic dV-Trainer (mdVT)</b> |  | <b>Da Vinci Skills Simulator</b> |  |
|--|--|--|--|---------------|--|--------------------------------|--|----------------------------------|--|

5. Have you attended any other robotic or simulation courses? If so, please specify

Y/N

.....

.....

**Section 4: Simulator Evaluation** (5=best rating, 1=worst rating)

1. Was your overall experience similar to that of the real da Vinci surgical robot?

|                    |   |   |   |   |   |                     |
|--------------------|---|---|---|---|---|---------------------|
| <b>Not Similar</b> | 1 | 2 | 3 | 4 | 5 | <b>Very Similar</b> |
|--------------------|---|---|---|---|---|---------------------|

2. Indicate your view on how realistic the **RobotiX Mentor** is in terms of:

- a. Hand controls                             1    2    3    4    5
- b. Graphics                                   1    2    3    4    5
- c. Clutch pedal                             1    2    3    4    5
- d. Camera pedal                            1    2    3    4    5
- e. Instrument swap pedal                 1    2    3    4    5
- f. Diathermy pedals                       1    2    3    4    5

3. Indicate your view on how realistic the **BND** task is in terms of:

- a. cutting of tissues                       1    2    3    4    5
- b. bleeding/coagulation of vessels       1    2    3    4    5
- c. Clipping of tissues                     1    2    3    4    5
- d. Behavior of tissues                     1    2    3    4    5
- e. Realism of anatomy                     1    2    3    4    5
- f. Camera movement                       1    2    3    4    5
- g. Behavior of instruments               1    2    3    4    5
- h. Change of instruments                 1    2    3    4    5
- i. Using third instrument                 1    2    3    4    5

4. Indicate your view on how realistic the **NVBD** tasks is in terms of:

- a. cutting of tissues                       1    2    3    4    5
- b. bleeding/coagulation of vessels       1    2    3    4    5
- c. Clipping of tissues                     1    2    3    4    5

- |  |   |   |   |   |   |
|--|---|---|---|---|---|
| d. Behavior of tissues                         | 1 | 2 | 3 | 4 | 5 |
| e. Realism of anatomy                          | 1 | 2 | 3 | 4 | 5 |
| f. Camera movement                             | 1 | 2 | 3 | 4 | 5 |
| g. Behavior of instruments                     | 1 | 2 | 3 | 4 | 5 |
| h. Change of instruments                       | 1 | 2 | 3 | 4 | 5 |
| i. Using 3 <sup>rd</sup> instrument retraction | 1 | 2 | 3 | 4 | 5 |
| j. Using 3 <sup>rd</sup> instrument clipper    | 1 | 2 | 3 | 4 | 5 |
| k. Using irrigation                            | 1 | 2 | 3 | 4 | 5 |
| l. Using virtual assistant                     | 1 | 2 | 3 | 4 | 5 |

(1=strongly disagree, 5=strongly agree)

- |   |   |   |   |   |   |
|---|---|---|---|---|---|
| 5. The <b>RobotiX Mentor</b> is a realistic training simulator for robotic surgery:                   | 1 | 2 | 3 | 4 | 5 |
| 6. There is a role for the <b>RobotiX Mentor</b> in training for robotic surgery:                     | 1 | 2 | 3 | 4 | 5 |
| 7. The <b>RobotiX Mentor</b> should be routinely used for training and assessment of robotic surgery: | 1 | 2 | 3 | 4 | 5 |
| 8. This session has improved my robotic skills:   | 1 | 2 | 3 | 4 | 5 |
| 9. The <b>RobotiX Mentor</b> is a good way to learn relevant robotic skills:                          | 1 | 2 | 3 | 4 | 5 |
| 10. This session increased my confidence in performing robotic surgery:                               | 1 | 2 | 3 | 4 | 5 |
| 11. I would recommend this to others:   | 1 | 2 | 3 | 4 | 5 |
| 12. There is a role for a validated robotic simulation programme in urology training:                 | 1 | 2 | 3 | 4 | 5 |
| 13. Trainees should learn an operation on a simulator prior to operating on a live patient:           | 1 | 2 | 3 | 4 | 5 |
| 14. Simulation-based training and assessment is essential for patient safety:                         | 1 | 2 | 3 | 4 | 5 |
| 15. A full procedure simulation has a beneficial educational impact on surgical training:             | 1 | 2 | 3 | 4 | 5 |
| 16. In your opinion, how important are the following tasks for robotic surgical training:             |   |   |   |   |   |
| a) tissue behavior in advanced simulation   | 1 | 2 | 3 | 4 | 5 |

- b) tissue dissection/cutting 1 2 3 4 5
- c) Vessel dissection 1 2 3 4 5
- d) Vessel coagulation 1 2 3 4 5
- e) Clipping of tissues 1 2 3 4 5
- f) Realism of anatomy 1 2 3 4 5
- g) Camera movement 1 2 3 4 5
- h) Behavior of instruments 1 2 3 4 5
- i) Change of instruments 1 2 3 4 5
- j) Using 3<sup>rd</sup> instrument retraction 1 2 3 4 5
- k) Using 3<sup>rd</sup> instrument clipper 1 2 3 4 5
- l) Using irrigation 1 2 3 4 5
- m) Using virtual assistant 1 2 3 4 5

17. Please rank the following six robotic surgical simulators:  
 (1=least recommended, 6=most recommended, if you have no experience of one simulator write NE beside that one)

|                                   |  |  |  |  |  |               |  |                                |  |                                  |  |
|-----------------------------------|--|--|--|--|--|---------------|--|--------------------------------|--|----------------------------------|--|
| <b>RobotiX Mentor (Simbionix)</b> |  | <b>Robotic Surgical Simulator (RoSS)</b> |  | <b>Simsurgery Educational Platform (SEP)</b> |  | <b>ProMIS</b> |  | <b>Mimic dV-Trainer (mdVT)</b> |  | <b>Da Vinci Skills Simulator</b> |  |
|-----------------------------------|--|--|--|--|--|---------------|--|--------------------------------|--|----------------------------------|--|

18. Should simulation be implemented into training programmes? Y/N

19. Should simulation be part of accreditation / (re)certification? Y/N

20. Do you think a full procedure simulation is beneficial for surgical education?

|                       |   |   |   |   |   |                   |
|-----------------------|---|---|---|---|---|-------------------|
| <b>Not Beneficial</b> | 1 | 2 | 3 | 4 | 5 | <b>Beneficial</b> |
|-----------------------|---|---|---|---|---|-------------------|

21. How feasible is incorporating the **RobotiX Mentor** into the training programme?

|                     |   |   |   |   |   |                 |
|---------------------|---|---|---|---|---|-----------------|
| <b>Not Feasible</b> | 1 | 2 | 3 | 4 | 5 | <b>Feasible</b> |
|---------------------|---|---|---|---|---|-----------------|

22. How acceptable is incorporating the **RobotiX Mentor** into the training programme?

|                       |   |   |   |   |   |                   |
|-----------------------|---|---|---|---|---|-------------------|
| <b>Not Acceptable</b> | 1 | 2 | 3 | 4 | 5 | <b>Acceptable</b> |
|-----------------------|---|---|---|---|---|-------------------|

**Thank you for your kind participation!**



## Simbionix RobotiX Mentor Validation Questionnaire

-Your responses will be processed anonymously-

### Section 1: Demographics

Name: .....

Age: .....

Year of study: .....

### Section 2: Advanced simulation: full procedure RARP

Please answer the following questions regarding the advanced simulation surgery for BND and NVBD. (5=best rating, 1=worst rating)

1. In your opinion, how useful did you find the modules?

1 2 3 4 5

### Section 3: Robotic BND

Please answer the following questions regarding the BND module.

2. In your opinion, how useful did you find the BND module?

1 2 3 4 5

3. What further additions could be made to this module?

.....  
.....  
.....

### Section 4: Robotic NVBD

Please answer the following questions regarding the NVBD module.

4. In your opinion, how useful did you find the NVBD module?

1 2 3 4 5

5. What further additions could be made to this module?

.....  
.....  
.....

### **Section 5: Features of RobotiX Mentor**

Please answer the following questions regarding the RobotiX Mentor console.  
(5=best rating, 1=worst rating)

6. In your opinion, how easy was it to use the hand controls?

1 2 3 4 5

7. In your opinion, how realistic were the graphics?

1 2 3 4 5

8. In your opinion, how easy was it to use the clutch pedal?

1 2 3 4 5

9. In your opinion, how easy was it to use the camera pedal?

1 2 3 4 5

10. In your opinion, how easy was it to use the instrument swap pedal?

1 2 3 4 5

11. In your opinion, how easy was it to use the diathermy pedal?

1 2 3 4 5

**Thank you for your kind participation!**