

APPENDIX A

INFORMED CONSENT FORM

Study Title: Patients' Information Needs of Perioperative Care: Perception of Patients and Nurses at the Hospital of University Science Malaysia (HUSM)

Investigator: Miss Norazliah Binti Samsudin

My name is Norazliah Binti Samsudin. I am a master's student of the Faculty of Nursing, Prince of Songkla University, Thailand. I am also a nurse educator in the nursing program at the School of Health Sciences, University Science of Malaysia, Health Campus, Kelantan. I am conducting a study to determine the current Patients' Information Needs of Perioperative Care: Perception of Patients and Nurses at the Hospital of University Science Malaysia. This is to fulfill the requirement of the master of nursing program at Prince of Songkla University, Hat Yai, Thailand.

The study and its procedures have been approved by the appropriate people and the Institutional Review Board (IRB) of the Prince of Songkla University, Thailand. The study procedures involve no foreseeable risks or harm to you or your organization. You are asked to respond to questions about your personal information and your perception of the level of your/patients need of information regarding perioperative care. It should take approximately 30-60 minutes to complete the questionnaire. A code number is used so that your identity will not be discovered.

The information gathered will be used to write a research report. The information will help to enhance nursing care in the clinical settings. It also will help to strengthen the preoperative teaching program for the nursing administration and perioperative nursing curriculum.

All information and your responses in connection with this study will remain confidential. Only the researcher and the advisors are eligible to access the data. Neither your name nor any identifying information will be used in the report of the study. The questionnaire will be destroyed after completion of the study.

Your participation in this study is voluntary. You have the right to participate or not to participate. You also have the right to withdraw at any time.

Lastly, returning the questionnaire indicates that you understand what is involved and your consent to participate in this study. You are free to ask any question about the study or being a subject.

 (Name of Participant) (Signature of Participant) Date

 (Name of Researcher) (Signature of Researcher) Date

If you have any inquiries, please contact:

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APPENDIX B

TABLE

Table B1

A matrix of the questionnaire patients' and nurses' perception of patients' information needs. Each cell presents item numbers in relation to five dimensions of information and three phases of perioperative period.

Dimensions of Perioperative Information	Perioperative Period			Total items
	Preoperative Phase	Intraoperative Phase	Postoperative Phase	
1 Situational or procedural information	1. 2. 3. 4. 5. 6*. 7. 8. 9. 10, 11*. 12*, 13*. 14*, 15*. 16*, 17*. 18*. 19*. 20*	6*. 11*. 12*. 15*. 16*. 17*. 18*	14*. 19*. 20* 46. 47	22
2 Sensation-discomfort information	21*, 22, 23. 24, 25, 26*. 27, 28, 29*. 30*	21*. 26*. 29*. 30*	48	11
3 Patients' role information	31. 32*. 33*, 34, 35*	32*, 33*. 35*	32*. 33*. 35*. 49, 50	7
4 Skills training information	36, 37*. 38*, 39*. 40*	-	37*. 38*. 39*. 40*	5
5 Psychosocial support information	41, 42, 43. 44*, 45*	44*. 45*	-	5
Total items	45	-	5	50

* Note. Items that represent information needed at two or three phases of perioperative period.

Table B2

Surgery schedule at the operation theatre HUSM.

Day	OR	OR 1	OR 3	OR 4	OR 5	OR 8	OR 9	OR 10	OR 11	OR 12	OR 13	OR 15
Sunday		Emergency	Urology	P/Surgery	Cardiac	Dental	Ophthalmology	Ortho	Ortho	-	Plastic	Neuro
Monday		Emergency	O&G	O&G	Cardiac	M/Facial	-	Ortho	Ortho	Ophthalmology	-	Neuro
Tuesday		Emergency	G/S Alt P/Surgery	G/Surgery	Cardiac	ENT	Ophthalmology	Urology/ LA	Ortho	Ophthalmology	-	-
Wednesday		Emergency	O&G	O&G	Cardiac	ENT/ G/S	Ophthalmology	-	Ortho	Ophthalmology	Plastic	-
Thursday		Emergency	Urology	G/Surgery	Cardiac	ENT/ LA	-	-	Ortho	Ophthalmology	Plastic	Neuro

Notes: P/Surgery - Pediatric Surgery, G/Surgery - General Surgery

Table B3

Mean, SD, and percentage of patients' information needs at preoperative phase as perceived patients ($n = 100$).

Patients' Information Needs at Preoperative Phase		Mean	SD	Percentage					N/A (%)
				1 (%)	2 (%)	3 (%)	4 (%)	5 (%)	
Situational or procedural information									
1	The date and time of surgery.	4.59	.64	-	1.0	5.0	28.0	66.0	-
2	The type of surgery you are going to have.	4.62	.69	-	2.0	6.0	20.0	72.0	-
3	The description of preoperative assessment (e.g. lab test, diagnostic procedures, electrocardiography (ECG), etc).	4.19	.94	3.0	2.0	12.0	39.0	44.0	-
4	Procedures the nurse will perform or ask you to do the day or night before surgery (e.g. bowel preparation, skin preparation, food and drink restriction or NPO, and intravenous fluid administration).	4.58	.67	-	2.0	4.0	28.0	66.0	-
5	Procedures the nurse will perform or ask you to do right before you go to the operating room [e.g. giving medications, removing jewelry and dentures, and urinating (empty your bladder)].	4.39	.89	2.0	3.0	6.0	32.0	57.0	-
6	The amount of time you will spend in the reception room (preoperative holding area), operating room, and recovery room (postanesthesia care unit).	4.11	.92	2.0	3.0	16.0	40.0	39.0	-
7	The sequence of events you will experience in the preoperative, intraoperative, and postoperative phase.	4.23	.97	2.0	6.0	8.0	35.0	49.0	-

Table B3 (continued).

	Patients' Information Needs at Preoperative Phase	Mean	SD	Percentage					N/A (%)
				1 (%)	2 (%)	3 (%)	4 (%)	5 (%)	
8	The estimated time you will need to recover from surgery (return to normal fitness).	4.67	.57	-	1.0	2.0	26.0	71.0	-
9	The usual length of hospital stay.	4.20	.83	-	4.0	14.0	40.0	42.0	-
10	The time of family visitations.	4.15	.86	1.0	5.0	9.0	48.0	37.0	-
11	The location of surgery suite, reception room (preoperative holding area), waiting area, and recovery room (postanesthesia care unit).	3.72	1.16	6.0	10.0	19.0	36.0	29.0	-
12	The general anesthesia that you may receive (e.g. procedures of anesthesia, types of anesthetic drug).	4.48	.84	-	4.0	10.0	20.0	66.0	-
13	The time an anesthetist will visit you to discuss what anesthesia will be used.	4.27	.87	-	6.0	10.0	35.0	49.0	-
14	Pain management including medication and its administration.	4.38	.81	1.0	2.0	9.0	34.0	54.0	-
15	Duration of the surgery.	4.37	.80	1.0	1.0	11.0	34.0	53.0	-
16	The site of the surgical incision you will have.	4.59	.59	-	-	5.0	31.0	64.0	-
17	The surgical procedure.	4.21	1.02	1.0	8.0	13.0	25.0	53.0	-
18	The approximate time to return to the ward, after you awake from the anesthesia.	3.81	1.02	-	15.0	18.0	38.0	29.0	-
19	The description of postoperative routine care [e.g. intravenous fluid infusion, wound care (surgical dressing), diet, medication, respiratory treatment, machines, drains, and nature of postoperative nursing assessment (frequently monitor of vital signs)].	4.49	.84	-	4.0	10.0	19.0	67.0	-

Table B3 (continued).

Patients' Information Needs at Preoperative Phase		Mean	SD	Percentage					N/A (%)
				1 (%)	2 (%)	3 (%)	4 (%)	5 (%)	
20	When you can start taking your diet after surgery.	4.66	.59	-	1.0	3.0	25.0	71.0	-
Sensation-discomfort information									
21	The feeling of having a facemask to assist you to breathe before and after surgery.	3.66	1.16	4.0	13.0	24.0	28.0	29.0	2.0
22	The feeling of pain sensation, nausea, etc.	3.93	1.10	5.0	5.0	17.0	37.0	35.0	1.0
23	The feeling of discomfort from tubes, catheter, etc.	4.04	1.08	4.0	6.0	13.0	35.0	41.0	1.0
24	The sensation you may feel as a result of preoperative medications (e.g. drowsy).	4.15	.89	-	5.0	16.0	35.0	40.0	4.0
25	The sensation of lying on the stretcher that will take you to and from surgery (e.g. lying down without pillow, having limited space, and wearing an operation gown).	3.62	1.21	7.0	12.0	20.0	33.0	27.0	1.0
26	The sensation you may feel after receiving anesthesia (e.g. hearing noises, dizziness, and not feeling anything after all).	4.07	1.01	2.0	6.0	17.0	32.0	42.0	1.0
27	The feeling of exciting or anxiety of seeing many medical equipments and unfamiliar environments (e.g. operating lights, masked/gowned personals)	3.34	1.31	11.0	21.0	19.0	26.0	20.0	3.0
28	The feeling of coldness in the operating room.	3.53	1.23	8.0	15.0	13.0	40.0	21.0	3.0

Table B3 (continued).

Patients' Information Needs at Preoperative Phase		Mean	SD	Percentage					N/A (%)
				1 (%)	2 (%)	3 (%)	4 (%)	5 (%)	
29	The smell and taste of certain drugs used for anesthesia induction (e.g. Xylocaine spray at your throat, halothane).	3.41	1.34	13.0	12.0	17.0	32.0	23.0	3.0
30	The sensation of discomfort from the tubes in your throat or nose.	3.61	1.31	10.0	10.0	14.0	31.0	28.0	7.0
Patients' role information									
31	Signing the informed consent only after understanding what is to be done during surgery.	4.74	.49	-	-	2.0	22.0	76.0	-
32	The way to request assistance whenever needed (e.g. asking for pain medication, moving out of bed).	4.24	.96	2.0	6.0	6.0	37.0	48.0	1.0
33	The activities you have to do throughout the perioperative period (e.g. making request of your needs preoperatively, postoperative exercising including deep breathing, range of motion exercises).	4.01	1.13	6.0	3.0	16.0	32.0	41.0	2.0
34	Staying in bed after receiving preoperative medication.	3.93	.98	2.0	9.0	11.0	48.0	28.0	2.0
35	Cooperating with nurses for monitoring your consciousness and vital signs.	4.38	.76	1.0	1.0	8.0	39.0	51.0	-
Skills training information									
36	Coping with stress and anxiety before surgery (e.g. deep breathing, praying, expressing your feeling).	4.13	1.07	3.0	6.0	14.0	27.0	48.0	2.0

Table B3 (continued).

Patients' Information Needs at Preoperative Phase		Mean	SD	Percentage					N/A (%)
				1 (%)	2 (%)	3 (%)	4 (%)	5 (%)	
37	Preventing chest complications (e.g. effective coughing, deep breathing exercises).	4.37	.75	-	2.0	10.0	35.0	50.0	3.0
38	Turning in bed, getting out and back into bed when you have surgical wound.	4.11	1.06	3.0	7.0	11.0	33.0	45.0	1.0
39	Practicing leg exercises and exercises of the upper and lower extremities after surgery.	4.41	.69	-	2.0	5.0	42.0	50.0	1.0
40	Practicing pain relief methods using non-pharmacological technique (e.g. distraction, imagery, music).	3.93	1.19	6.0	8.0	12.0	33.0	39.0	2.0
Psychosocial support information									
41	Having nurses to listen and answer to your worries/concerns about surgery.	4.15	.98	2.0	6.0	11.0	36.0	44.0	1.0
42	Being reassured that it is common to have fear and anxiety about surgery.	4.01	1.05	3.0	7.0	13.0	37.0	37.0	3.0
43	Being informed where your family members and friends can wait while you are in the operating room.	4.24	.87	1.0	3.0	13.0	36.0	46.0	1.0
44	Being reassured that your family members can see you after surgery.	4.49	.71	-	2.0	6.0	32.0	59.0	1.0
45	Being reassured that your family will be informed regarding the progress of surgery.	4.49	.77	1.0	2.0	5.0	31.0	61.0	-

Table B4

Mean, SD, and percentage of patients' information needs at intraoperative phase as perceived by patients ($n = 100$).

Patients' Information Needs at Intraoperative Phase		Mean	SD	Percentage					N/A %
				1 %	2 %	3 %	4 %	5 %	
Situational or procedural information									
6	The amount of time you will spend in the reception room (preoperative holding area), operating room, and recovery room (postanesthesia care unit).	4.11	.92	2.0	3.0	16.0	40.0	39.0	-
11	The location of surgery suite, reception room (preoperative holding area), waiting area, and recovery room (postanesthesia care unit).	3.72	1.16	6.0	10.0	19.0	36.0	29.0	-
12	The general anesthesia that you may receive (e.g. procedures of anesthesia, types of anesthetic drug).	4.48	.84	-	4.0	10.0	20.0	66.0	-
15	Duration of the surgery.	4.37	.80	1.0	1.0	11.0	34.0	53.0	-
16	The site of the surgical incision you will have.	4.59	.59	-	-	5.0	31.0	64.0	-
17	The surgical procedure.	4.21	1.02	1.0	8.0	13.0	25.0	53.0	-
18	The approximate time to return to the ward, after you awake from the anesthesia.	3.81	1.02	-	15.0	18.0	38.0	29.0	-
Sensation-discomfort information									
21	The feeling of having a facemask to assist you to breathe before and after surgery.	3.66	1.16	4.0	13.0	24.0	28.0	29.0	2.0

Table B4 (continued).

Patients' Information Needs at Intraoperative Phase		Mean	SD	Percentage					N/A %
				1 %	2 %	3 %	4 %	5 %	
26	The sensation you may feel after receiving anesthesia (e.g. hearing noises, dizziness, and not feeling anything after all).	4.07	1.01	2.0	6.0	17.0	32.0	42.0	1.0
29	The smell and taste of certain drugs used for anesthesia induction (e.g. Xylocaine spray at your throat, halothane).	3.41	1.34	13.0	12.0	17.0	32.0	23.0	3.0
30	The sensation of discomfort from the tubes in your throat or nose.	3.61	1.31	10.0	10.0	14.0	31.0	38.0	7.0
Patients' role information									
32	The way to request assistance whenever needed (e.g. asking for pain medication, moving out of bed).	4.24	.96	2.0	6.0	6.0	37.0	48.0	1.0
33	The activities you have to do throughout the perioperative period (e.g. making request of your needs preoperatively, postoperative exercising including deep breathing, range of motion exercises).	4.01	1.13	6.0	3.0	16.0	32.0	41.0	2.0
35	Cooperating with nurses for monitoring your consciousness and vital signs.	4.38	.76	1.0	1.0	8.0	39.0	51.0	-
Psychosocial support information									
44	Being reassured that your family members can see you after surgery.	4.49	.71	-	2.0	6.0	32.0	59.0	1.0
45	Being reassured that your family will be informed regarding the progress of surgery.	4.49	.77	1.0	2.0	5.0	31.0	61.0	-

Table B5

Mean, SD, and percentage of patients' information needs at postoperative phase perceived by patients ($n = 100$).

Patients' Information Needs at Postoperative Phase		Mean	SD	Percentage					N/A %
				1 %	2 %	3 %	4 %	5 %	
Situational or procedural information									
14	Pain management including medication and its administration.	4.38	.81	1.0	2.0	9.0	34.0	54.0	-
19	The description of postoperative routine care [e.g. intravenous fluid infusion, wound care (surgical dressing), diet, medication, respiratory treatment, machines, drains, and nature of postoperative nursing assessment (frequently monitor of vital signs)].	4.49	.84	-	4.0	10.0	19.0	67.0	-
20	When you can start taking your diet after surgery.	4.66	.59	-	1.0	3.0	25.0	71.0	-
46	The care you may need after being discharged from hospital (e.g. wound care).	4.65	.73	1.0	2.0	3.0	19.0	75.0	-
47	When the intravenous infusion, drains, cast, dressings, and sutures will be removed.	4.41	.75	-	3.0	7.0	36.0	54.0	-
Sensation-discomfort information									
48	The feeling of discomfort when the tubes, drains, catheters, etc are removed from your body.	4.02	.99	2.0	4.0	22.0	31.0	38.0	3.0
Patients' role information									
32	The way to request assistance whenever needed (e.g. asking for pain medication, moving out of bed).	4.24	.96	2.0	6.0	6.0	37.0	48.0	1.0

Table B5 (continued).

Patients' Information Needs at Postoperative Phase		Mean	SD	Percentage					N/A %
				1 %	2 %	3 %	4 %	5 %	
33	The activities you have to do throughout the perioperative period (e.g. making request of your needs preoperatively, postoperative exercising including deep breathing, range of motion exercises).	4.01	1.13	6.0	3.0	16.0	32.0	41.0	2.0
35	Cooperating with nurses for monitoring your consciousness and vital signs.	4.38	.76	1.0	1.0	8.0	39.0	51.0	-
49	Observing and reporting to nurses if you feel there will be something wrong (e.g. having fever, pain, swelling, and smelling from the wound, etc).	4.69	.49	-	-	1.0	29.0	70.0	-
50	Taking care of your surgical wound (e.g. to keep the wound dry and clean).	4.71	.57	-	-	6.0	17.0	77.0	-
Skills training information									
37	Preventing chest complications (e.g. effective coughing, deep breathing exercises).	4.37	.75	-	2.0	10.0	35.0	50.0	3.0
38	Turning in bed, getting out and back into bed when you have surgical wound.	4.11	1.06	3.0	7.0	11.0	33.0	45.0	1.0
39	Practicing leg exercises and exercises of the upper and lower extremities after surgery.	4.41	.69	-	2.0	5.0	42.0	50.0	1.0
40	Practicing pain relief methods using non-pharmacological technique (e.g. distraction, imagery, music).	3.93	1.19	6.0	8.0	12.0	33.0	39.0	2.0

Table B6

Mean, SD, and percentage of patients' information needs at preoperative phase as perceived by nurses ($n = 130$).

Patients' Information Needs at Preoperative Phase		Mean	SD	Percentage					N/A %
				1 %	2 %	3 %	4 %	5 %	
Situational or procedural information									
1	The date and time of surgery.	4.78	.43	-	-	.8	20.0	79.0	-
2	The type of surgery your patients are going to have.	4.93	.26	-	-	-	6.9	93.1	-
3	The description of preoperative assessment (e.g. lab test, diagnostic procedures, electrocardiography (ECG), etc).	4.54	.67	.8	1.5	.8	36.9	60.0	-
4	Procedures you will perform or ask your patients to do the day or night before surgery (e.g. bowel preparation, skin preparation, food and drink restriction or NPO, and intravenous fluid administration).	4.56	.61	-	.8	3.8	33.8	61.5	-
5	Procedures you will perform or ask your patients to do right before they go to the operating room [e.g. giving medications, removing jewelry and dentures, and urinating (empty their bladder)].	4.70	.51	-	-	2.3	25.4	72.3	-
6	The amount of time your patients will spend in the reception room (preoperative holding area), operating room, and recovery room (postanesthesia care unit).	3.94	.84	.8	3.1	23.1	43.1	25.4	4.6
7	The sequence of events your patients will experience in the preoperative, intraoperative, and postoperative phase.	4.18	.73	-	2.3	11.5	48.5	33.1	4.6
8	The estimated time your patients will need to recover from surgery (return to normal fitness).	4.21	.73	-	1.5	13.1	47.7	36.9	.8
9	The usual length of hospital stay.	4.03	.84	.8	3.8	17.7	46.9	30.8	-

Table B6 (continued).

Patients' Information Needs at Preoperative Phase		Mean	SD	Percentage					N/A %
				1 %	2 %	3 %	4 %	5 %	
10	The time of family visitations	4.38	.64	-	-	8.5	44.6	46.2	.8
11	The location of surgery suite, reception room (preoperative holding area), waiting area, and recovery room (postanesthesia care unit).	3.99	.87	-	5.4	21.5	40.0	31.5	1.5
12	The general anesthesia that your patients may receive (e.g. procedures of anesthesia, types of anesthetic drug).	4.20	.83	-	2.3	17.7	33.8	41.5	4.6
13	The time an anesthetist will visit your patients to discuss what anesthesia will be used.	4.20	.84	.8	2.3	14.6	39.2	41.5	1.5
14	Pain management including medication and its administration.	4.28	.77	-	3.8	7.7	45.4	43.1	-
15	Duration of the surgery.	3.98	.81	-	5.4	16.9	51.5	25.4	.8
16	The site of the surgical incision your patients will have.	4.38	.79	.8	3.1	5.4	39.2	51.5	-
17	The surgical procedure	4.13	.92	1.5	4.6	12.3	40.8	39.2	1.5
18	The approximate time to return to the ward, after your patients awake from the anesthesia.	3.89	.87	.8	6.2	20.0	49.2	23.8	-
19	The description of postoperative routine care [e.g. intravenous fluid infusion, wound care (surgical dressing), diet, medication, respiratory treatment, machines, drains, and nature of postoperative nursing assessment (frequently monitor of vital signs)].	4.26	.82	-	4.6	10.0	40.0	45.4	-
20	When your patients can start taking their diet after surgery.	4.42	.59	-	-	5.4	47.7	46.9	-

Table B6 (continued).

Patients' Information Needs at Preoperative Phase		Mean	SD	Percentage					N/A %
				1 %	2 %	3 %	4 %	5 %	
Sensation-discomfort information									
21	The feeling of having a facemask to assist your patients to breathe before and after surgery.	4.06	.83	.8	2.3	19.2	44.6	32.3	.8
22	The feeling of pain sensation, nausea, etc.	4.18	.76	.8	.8	13.8	48.5	35.4	.8
23	The feeling of discomfort from tubes, catheter, etc.	4.21	.66	-	-	13.1	52.3	33.8	.8
24	The sensation your patients may feel as a result of preoperative medications (e.g. drowsy).	4.24	.66	-	-	12.3	51.5	36.2	-
25	The sensation of lying on the stretcher that will take your patients to and from surgery (e.g. lying down without pillow, having limited space, and wearing an operation gown).	4.12	.82	-	3.1	18.5	40.0	36.2	2.3
26	The sensation your patients may feel after receiving anesthesia (e.g. hearing noises, dizziness, and not feeling anything after all).	4.08	.86	-	6.2	14.6	43.8	35.4	-
27	The feeling of exciting or anxiety of seeing many medical equipments and unfamiliar environments (e.g. operating lights, masked/gowned personals)	3.85	.99	3.8	3.1	23.1	40.0	26.2	3.8
28	The feeling of coldness in the operating room.	3.71	.89	1.5	4.6	33.1	39.2	18.5	3.1
29	The smell and taste of certain drugs used for anesthesia induction (e.g. Xylocaine spray at your patients throat, halothane).	3.82	.89	2.3	3.1	25.4	46.2	20.8	2.3

Table B6 (continued).

Patients' Information Needs at Preoperative Phase		Mean	SD	Percentage					N/A %
				1 %	2 %	3 %	4 %	5 %	
30	The sensation of discomfort from the tubes in your patients' throat or nose.	4.06	.86	1.5	2.3	17.7	44.5	33.1	.8
Patients' role information									
31	Signing the informed consent only after understanding what is to be done during surgery.	4.77	.56	-	-	1.5	19.2	77.7	1.5
32	The way to request assistance whenever needed (e.g. asking for pain medication, moving out of bed).	4.38	.71	-	2.3	6.2	42.3	49.2	-
33	The activities your patients have to do throughout the perioperative period (e.g. making request of their needs preoperatively, postoperative exercising including deep breathing, range of motion exercises).	4.45	.65	-	.8	6.2	40.0	51.5	1.5
34	Staying in bed after receiving preoperative medication.	4.23	.79	-	3.8	10.0	44.6	40.8	.8
35	Cooperating with you for monitoring your patients' consciousness and vital signs.	4.46	.72	.8	-	8.5	32.3	56.2	2.3
Skills training information									
36	Coping with stress and anxiety before surgery (e.g. deep breathing, praying, expressing their feeling).	4.38	.69	-	1.5	6.9	43.1	48.5	-
37	Preventing chest complications (e.g. effective coughing, deep breathing exercises).	4.50	.59	-	.8	2.3	43.1	53.8	-
38	Turning in bed, getting out and back into bed when your patients have surgical wound.	4.40	.64	-	.8	6.2	45.4	46.9	.8

Table B6 (continued).

Patients' Information Needs at Preoperative Phase		Mean	SD	Percentage					N/A
				1 %	2 %	3 %	4 %	5 %	
39	Practicing leg exercises and a range of motion exercises of the upper and lower extremities after surgery.	4.42	.58	-	-	4.5	48.5	46.2	.8
40	Practicing pain relief methods using non-pharmacological technique (e.g. distraction, imagery, music).	4.03	.85	-	3.8	20.8	39.2	31.5	4.6
Psychosocial support information									
41	Having you to listen and answer to your patients' worries/concerns about surgery	4.20	.77	-	3.1	11.5	45.4	36.9	3.1
42	Being reassured that it is common to have fear and anxiety about surgery.	4.27	.73	-	1.5	11.5	44.6	40.8	1.5
43	Being informed where your patients' family members and friends can wait while they are in the operating room.	4.17	.68	-	1.5	10.8	54.6	30.8	2.3
44	Being reassured that your patients' family members can see them after surgery.	4.16	.72	-	.8	16.9	47.7	33.8	.8
45	Being reassured that your patients' family will be informed regarding the progress of surgery.	4.11	.84	.8	3.8	13.1	45.4	33.8	3.1

Table B7

Mean, SD, and percentage of patients' information needs at intraoperative phase as perceived by nurses (n = 130).

Patients' Information Needs at Intraoperative Phase		Mean	SD	Percentage					N/A %
				1 %	2 %	3 %	4 %	5 %	
Situational or procedural information									
6	The amount of time your patients will spend in the reception room (preoperative holding area), operating room, and recovery room (postanesthesia care unit).	3.94	.84	.8	3.1	23.1	43.1	25.4	4.6
11	The location of surgery suite, reception room (preoperative holding area), waiting area, and recovery room (postanesthesia care unit).	3.99	.87	-	5.4	21.5	40.0	31.5	1.5
12	The general anesthesia that your patients may receive (e.g. procedures of anesthesia, types of anesthetic drug).	4.20	.82	-	2.3	17.7	33.8	41.5	4.6
15	Duration of the surgery.	3.98	.81	-	5.4	16.9	51.5	25.4	.8
16	The site of the surgical incision your patients will have.	4.38	.79	.8	3.1	5.4	39.2	51.5	-
17	The surgical procedure.	4.13	.92	1.5	4.6	12.3	40.8	39.2	1.5
18	The approximate time to return to the ward, after your patients awake from the anesthesia.	3.89	.87	.8	6.2	20.0	49.2	23.8	-
Sensation-discomfort information									
21	The feeling of having a facemask to assist your patients to breathe before and after surgery.	4.06	.83	.8	2.3	19.2	44.6	32.3	.8
26	The sensation your patients may feel after receiving anesthesia (e.g. hearing noises, dizziness, and not feeling anything after all).	4.08	.86	-	6.2	14.6	43.8	35.4	-

Table B7 (continued).

Patients' Information Needs at Intraoperative Phase		Mean	SD	Percentage					
				1 %	2 %	3 %	4 %	5 %	N/A %
29	The smell and taste of certain drugs used for anesthesia induction (e.g. Xylocaine spray at your patients throat, halothane).	3.82	.89	2.3	3.1	25.4	46.2	20.8	2.3
30	The sensation of discomfort from the tubes in your patients' throat or nose.	4.05	.86	1.5	2.3	17.7	44.6	33.1	.8
Patients role information									
32	The way to request assistance whenever needed (e.g. asking for pain medication, moving out of bed).	4.38	.71	-	2.3	6.2	42.3	49.2	-
33	The activities your patients have to do throughout the perioperative period (e.g. making request of their needs preoperatively, postoperative exercising including deep breathing, range of motion exercises).	4.45	.65	-	.8	6.2	40.0	51.5	1.5
35	Cooperating with you for monitoring your patients' consciousness and vital signs.	4.46	.72	.8	-	8.5	32.3	56.2	2.3
Psychosocial support information									
44	Being reassured that your patients' family members can see them after surgery.	4.16	.72	-	.8	16.9	47.7	33.8	.8
45	Being reassured that your patients' family will be informed regarding the progress of surgery.	4.11	.84	.8	3.8	13.1	45.4	33.8	3.1

Table B8

Mean, SD, and percentage of patients' information needs at postoperative phase as perceived by nurses (n = 130).

Patients' Information Needs at Postoperative Phase		Mean	SD	Percentage					N/A
				1 %	2 %	3 %	4 %	5 %	
Situational or procedural information									
14	Pain management including medication and its administration.	4.28	.77	-	3.8	7.7	45.4	43.1	-
19	The description of postoperative routine care [e.g. intravenous fluid infusion, wound care (surgical dressing), diet, medication, respiratory treatment, machines, drains, and nature of postoperative nursing assessment (frequently monitor of vital signs)].	4.26	.82	-	4.6	10.0	40.0	45.4	-
20	When your patients can start taking their diet after surgery.	4.42	.59	-	-	5.4	47.7	46.9	-
46	The care your patients may need after being discharged from hospital (e.g. wound care).	4.65	.56	-	-	3.8	27.7	68.5	-
47	When the intravenous infusion, drains, cast, dressings, and sutures will be removed.	4.28	.72	-	.8	13.1	43.8	42.3	-
Sensation-discomfort information									
48	The feeling of discomfort when the tubes, drains, catheters, etc are removed from your patients' body.	4.18	.67	-	.8	12.3	54.6	32.3	-
Patients' role information									
32	The way to request assistance whenever needed (e.g. asking for pain medication, moving out of bed).	4.38	.71	-	2.3	6.2	42.3	49.2	-

Table B8 (continued).

Patients' Information Needs at Postoperative Phase		Mean	SD	Percentage					N/A %
				1 %	2 %	3 %	4 %	5 %	
33	The activities your patients have to do throughout the perioperative period (e.g. making request of their needs preoperatively, postoperative exercising including deep breathing, range of motion exercises).	4.45	.65	-	.8	6.2	40.0	51.5	1.5
35	Cooperating with you for monitoring your patients' consciousness and vital signs.	4.46	.72	.8	-	8.5	32.3	56.2	2.3
49	Observing and reporting to you if your patients feel there will be something wrong (e.g. having fever, pain, swelling, and smelling from the wound, etc).	4.66	.54	-	-	3.1	27.7	69.2	-
50	Taking care of their surgical wound (e.g. to keep the wound dry and clean).	4.72	.50	-	-	2.3	23.8	73.8	-
Skills training information									
37	Preventing chest complications (e.g. effective coughing, deep breathing exercises).	4.50	.59	-	.8	2.3	43.1	53.8	-
38	Turning in bed, getting out and back into bed when your patients have surgical wound.	4.40	.64	-	.8	6.2	45.4	46.9	.8
39	Practicing leg exercises and a range of motion exercises of the upper and lower extremities after surgery.	4.42	.58	-	-	4.6	48.5	46.2	.8
40	Practicing pain relief methods using non-pharmacological technique (e.g. distraction, imagery, music).	4.03	.85	-	3.8	20.8	39.2	31.5	4.6

Table B9

Frequency and percentage of time information needed in perioperative care as perceived by patients (n = 100).

Variables	Time information needed							
	(%)							
	Preop.	Intraop.	Postop.	Preop. and Intraop.	Preop. and Postop.	Intraop. and Postop.	Preop, Intraop. and Postop.	No
SPI1	87.0	-	-	5.0	6.0	-	2.0	-
SPI2	76.0	-	1.0	7.0	9.0	-	7.0	-
SPI3	70.0	-	1.0	7.0	-	16.0	-	3.0
SPI4	77.0	-	2.0	3.0	12.0	-	6.0	-
SPI5	84.0	-	1.0	6.0	5.0	-	3.0	1.0
SPI6	54.0	2.0	5.0	10.0	12.0	2.0	13.0	2.0
SPI7	45.0	1.0	8.0	1.0	20.0	1.0	22.0	2.0
SPI8	21.0	-	27.0	1.0	45.0	-	6.0	-
SPI9	31.0	-	24.0	-	37.0	-	8.0	-
SPI10	32.0	-	11.0	-	36.0	1.0	20.0	-
SPI11	60.0	6.0	1.0	9.0	8.0	-	10.0	6.0
SPI12	71.0	2.0	-	15.0	6.0	-	6.0	-
SPI13	81.0	2.0	-	8.0	6.0	-	3.0	-
SPI14	19.0	1.0	22.0	-	38.0	3.0	16.0	1.0
SPI15	66.0	5.0	3.0	8.0	12.0	1.0	4.0	1.0
SPI16	70.0	-	2.0	6.0	13.0	-	9.0	-
SPI17	70.0	2.0	2.0	7.0	12.0	-	6.0	1.0
SPI18	37.0	2.0	29.0	7.0	17.0	2.0	6.0	-
SPI19	19.0	1.0	33.0	1.0	33.0	1.0	12.0	-
SPI20	17.0	-	54.0	-	21.0	1.0	7.0	-
SDI21	57.0	6.0	4.0	11.0	12.0	1.0	5.0	4.0
SDI22	33.0	1.0	32.0	3.0	20.0	4.0	5.0	2.0
SDI23	34.0	1.0	29.0	1.0	24.0	3.0	5.0	3.0
SDI24	53.0	2.0	14.0	8.0	17.0	1.0	4.0	1.0
SDI25	58.0	2.0	9.0	7.0	11.0	2.0	6.0	5.0
SDI26	54.0	5.0	12.0	5.0	14.0	3.0	5.0	2.0
SDI27	58.0	17.0	2.0	5.0	3.0	2.0	4.0	9.0

Table B9 (continued).

Variables	Time information needed							
	(%)							
	Preop.	Intraop.	Postop.	Preop. and Intraop.	Preop. and Postop.	Intraop. and Postop.	Preop. Intraop. and Postop.	No
SDI28	50.0	10.0	2.0	10.0	12.0	5.0	4.0	7.0
SDI29	59.0	7.0	9.0	6.0	7.0	2.0	3.0	7.0
SDI30	46.0	6.0	14.0	5.0	14.0	3.0	4.0	8.0
PRI31	88.0	1.0	-	3.0	5.0	1.0	2.0	-
PRI32	25.0	1.0	34.0	1.0	28.0	3.0	7.0	1.0
PRI33	24.0	1.0	31.0	1.0	26.0	2.0	9.0	6.0
PRI34	65.0	2.0	12.0	2.0	12.0	-	4.0	3.0
PRI35	30.0	-	11.0	2.0	33.0	1.0	22.0	-
STI36	64.0	2.0	1.0	5.0	15.0	-	10.0	3.0
STI37	34.0	-	25.0	1.0	27.0	1.0	11.0	1.0
STI38	16.0	1.0	52.0	-	20.0	3.0	5.0	3.0
STI39	17.0	-	58.0	-	20.0	-	4.0	1.0
STI40	19.0	-	46.0	1.0	20.0	1.0	6.0	7.0
PSI41	36.0	-	13.0	6.0	34.0	-	9.0	2.0
PSI42	66.0	1.0	6.0	8.0	10.0	-	5.0	4.0
PSI43	55.0	5.0	5.0	11.0	11.0	2.0	11.0	-
PSI44	35.0	1.0	23.0	3.0	29.0	-	8.0	1.0
PSI45	24.0	12.0	25.0	5.0	14.0	7.0	13.0	-
SPI46	9.0	-	63.0	-	22.0	-	3.0	-
SPI47	11.0	-	65.0	-	18.0	4.0	1.0	-
SDI48	16.0	2.0	48.0	-	21.0	4.0	5.0	4.0
PRI49	9.0	-	53.0	1.0	30.0	2.0	5.0	-
PRI50	7.0	-	66.0	-	20.0	2.0	5.0	-

Notes. SPI-Situational or procedural information, SDI-Sensation-discomfort information, PRI-Patients' role information, STI-Skills training information, PSI-Psychosocial support information.

Table B10

Frequency and percentage of time information needed in perioperative care as perceived by nurses (n = 130).

Variables	Time information needed								No
	n (%)								
	Preop.	Intraop.	Postop.	Preop. and Intraop.	Preop. and Postop.	Intraop. and Postop.	Preop. and Intraop. and Postop.		
SPI1	112(86.2)	-	-	6(4.6)	2(1.5)	-	10(7.7)	-	-
SPI2	102(78.5)	-	-	1(9.2)	5(3.8)	-	1(8.5)	-	-
SPI3	115(88.5)	-	-	3(2.3)	6(4.6)	-	6(4.6)	-	-
SPI4	111(85.4)	-	-	10(7.7)	8(6.2)	-	1(.8)	-	-
SPI5	110(84.6)	1(.8)	1(.8)	13(10.0)	3(2.3)	-	2(1.5)	-	-
SPI6	65 (50.0)	14(10.8)	7(5.8)	14(10.8)	7(5.4)	1(.8)	19(14.6)	3(2.3)	-
SPI7	60 (46.2)	3(2.3)	4 (3.1)	2(1.5)	18(13.8)	1(.8)	40(30.8)	2(1.5)	-
SPI8	48 (36.9)	2(1.5)	22(16.9)	5(3.8)	39(30.0)	4(3.1)	10(7.7)	-	-
SPI9	49 (37.7)	-	21(16.2)	1(.8)	46(35.4)	1(.8)	12(9.2)	-	-
SPI10	56 (43.1)	-	13(10.0)	-	36(27.7)	-	25(19.2)	-	-
SPI11	89 (68.5)	9(6.9)	1(.8)	8(6.2)	9(6.9)	-	12(9.2)	2(1.5)	-
SPI12	83 (63.8)	9(6.9)	2(1.5)	20(15.4)	5(3.8)	-	11(8.5)	-	-
SPI13	112(86.2)	-	1(.8)	7(5.4)	5(3.8)	-	5(3.8)	-	-
SPI14	36(27.7)	4 (3.1)	28(21.5)	7(5.4)	26(20.0)	6(4.6)	23(17.7)	-	-
SPI15	99(76.2)	8(6.2)	-	13(10.0)	5(3.8)	1(.8)	4(3.1)	-	-
SPI16	97(74.6)	5(3.8)	-	18(13.8)	6(4.6)	-	3(2.3)	1(.8)	-
SPI17	97(74.6)	8(6.2)	-	12(9.2)	4 (3.1)	-	6(4.6)	3(2.3)	-
SPI18	67(51.5)	8(6.2)	20(15.4)	4(3.1)	17(13.1)	4(3.1)	9(6.9)	1(.8)	-
SPI19	39 (30.0)	-	30(23.1)	2(1.5)	36(27.7)	3(2.3)	20(15.4)	-	-
SPI20	19 (14.6)	-	52(40.0)	-	57(43.8)	-	2(1.5)	-	-
SDI21	45 (34.6)	7(5.4)	14(10.8)	5(3.8)	37(28.5)	5(3.8)	16(12.3)	1(.8)	-
SDI22	31 (23.8)	1(.8)	39(30.0)	1(.8)	33(25.4)	9(6.9)	15(11.5)	1(.8)	-
SDI23	31 (23.8)	1(.8)	35(26.9)	1(.8)	40(30.8)	3(2.3)	18(13.8)	1(.8)	-
SDI24	83 (63.8)	1(.8)	9(6.9)	4(3.1)	17(13.1)	4(3.1)	12(9.2)	-	-
SDI25	75 (57.7)	-	8(6.2)	5(3.8)	25(19.2)	2(1.5)	12(9.2)	3(2.3)	-
SDI26	53 (40.8)	8(6.2)	18(13.8)	16(12.3)	17(13.1)	9(6.9)	9(6.9)	-	-
SDI27	56 (43.1)	23(17.7)	1(.8)	27(20.8)	3(2.3)	6(4.6)	9(6.9)	5(3.8)	-

Table 10 (continued).

Variables	Time information needed								No
	n (%)								
	Preop.	Intraop.	Postop.	Preop. and Intraop.	Preop. and Postop.	Intraop. and Postop.	Preop. and Intraop. and Postop.	Preop. and Postop.	
SDI28	56 (43.1)	18(13.8)	7(5.4)	26(20.0)	6(4.6)	8(6.2)	6(4.6)	3(2.3)	
SDI29	63 (48.5)	23(17.7)	3(2.3)	23(17.7)	3(2.3)	5(3.8)	8(6.2)	2(1.5)	
SDI30	55 (42.3)	20(15.4)	8(6.2)	20(15.4)	10(7.7)	4(3.1)	12(9.2)	1(.8)	
PRI31	120(92.3)	1(.8)	-	6(4.6)	1(.8)	-	2(1.5)	-	
PRI32	30 (23.1)	-	50(38.5)	4(3.1)	29(22.3)	5(3.8)	12(9.2)	-	
PRI33	59 (45.4)	-	13(10.0)	2(1.5)	47(36.2)	1(.8)	8(6.2)	-	
PRI34	110(84.6)	3(2.3)	3(2.3)	5(3.8)	7(5.4)	-	2(1.5)	-	
PRI35	38 (29.2)	2(1.5)	26(20.0)	2(1.5)	27(20.8)	4(3.1)	30(23.1)	1(.8)	
STI36	103(79.2)	-	1 (.8)	8 (6.2)	14(10.8)	-	4 (3.1)	-	
STI37	32(24.6)	2(1.5)	31(23.8)	3(2.3)	57(43.8)	1(.8)	4 (3.1)	-	
STI38	13(10.0)	-	74(56.9)	-	40(30.8)	1(.8)	2(1.5)	-	
STI39	14(10.8)	-	76(58.5)	-	40(30.8)	-	-	-	
STI40	30(23.1)	-	57(43.8)	-	39(30.0)	-	1(.8)	3(2.3)	
PSI41	86(66.2)	-	8(6.2)	4 (3.1)	27(20.8)	-	3(2.3)	2(1.5)	
PSI42	107(82.3)	-	2(1.5)	7(5.4)	12(9.2)	-	1(.8)	1(.8)	
PSI43	95 (73.1)	7(5.4)	3(2.3)	15(11.5)	5(3.8)	-	4(3.1)	1(.8)	
PSI44	76 (58.5)	3(2.3)	16(12.3)	1(.8)	26(20.0)	2(1.5)	5(3.8)	1(.8)	
PSI45	53 (40.8)	14(10.8)	24(18.5)	10(7.7)	11(8.5)	8(6.2)	10(7.7)	-	
SPI46	4 (3.1)	-	96(73.8)	1(.8)	26(20.0)	-	3(2.3)	-	
SPI47	7 (5.4)	-	92(70.8)	-	27(20.8)	-	4 (3.1)	-	
SDI48	7 (5.4)	-	90(69.2)	-	29(22.3)	1(.8)	3(2.3)	-	
PRI49	5 (3.8)	-	93(71.5)	-	29(22.3)	1(.8)	2(1.5)	-	
PRI50	2 (1.5)	1(.8)	96(73.8)	-	27(20.8)	2(1.5)	2(1.5)	-	

Notes. SPI-Situational or procedural information. SDI-Sensation-discomfort information.

PRI-Patients' role information, STI-Skills training information, PSI-Psychosocial support information.

APPENDIX C

PATIENTS' INFORMATION NEEDS IN PERIOPERATIVE CARE

(Form 1: Questionnaire for Patient)

Code: _____

Date: _____

Time: _____

Ward: _____

Introduction: This instrument is divided into two parts. Part 1 is related to patient's demographic data. Part 2 is related to patients' perception of information needs in perioperative care. One open-ended question is asked to identify unlisted information that the patient may need.

Part 1: Assessment of Demographic Data

Instruction: Please check "√" or write in the appropriate sections. Items number 10 and 11 will be filled by the researcher.

1. Gender

1. Female 2. Male

2. Age _____ years old

3. Marital status

1. Single 2. Married 3. Widowed 4. Divorced

4. Race

1. Malay 2. Chinese 3. Indian 4. Others _____

5. Religion

1. Islam 2. Christian 3. Hindu 4. Buddhist

5. Others _____

6. Level of education

1. Primary school 2. Secondary school 3. Diploma

4. Bachelor degree 5. Master degree 6. Doctorate degree

7. Occupation

1. None 2. Student 3. Farmer 4. Government employee

5. Private employee 6. Self employed 7. Laborer

() 8. Retired () 9. Others _____

8. Income per month:

- () 1. none () 2. < RM 500
 () 3. RM 501 - RM 1 500 () 4. RM 1 501 - RM 3 000
 () 5. RM 3 001 - RM 5 000 () 6. >RM 5 001

9. Have you ever had an operation before?

- () 1. Yes () 2. No

If yes, please specify:

10. Medical Diagnosis as written on medical record (for the researcher only)

11. Type of surgery as written on medical record (for the researcher only)

Part 2: Assessment of Patient's Perception of Information Needs

Instruction: We are interested in knowing the types and time of information you need related to your surgery. Please read each of the following statements and check "√" the number that best describes the level of your need and time each information is needed. If any item is not related to your condition, please check "√" not applicable.

Level of your need

- 1 = not needed
 2 = slightly needed
 3 = moderately needed
 4 = most needed
 5 = extremely needed
 N/A = not applicable

Time the information is needed

- Before surgery = you need this information while you are waiting for the surgery
 During surgery = you need this information while you in the operating theatre
 After surgery = you need this information after the surgery is ended and you are recovering at the surgical ward

(You can check "√" more than 1 column)

No	Items	Rating of Patients' Level of Information Needs						Time Information Needed		
		1	2	3	4	5	N/A	Before surgery	During surgery	After surgery
50	Taking care of your surgical wound (e.g. to keep the wound dry and clean).									

Additional Question:

Instruction: Please answer the following question by writing on the given space.

1. Do you need other information regarding your surgery that are not listed on the questionnaire?

If so, please specify:

Thank you for your cooperation

APPENDIX D

PATIENTS' INFORMATION NEEDS IN PERIOPERATIVE CARE

(Form 2: Questionnaire for Nurses)

Code: _____

Date: _____

Time: _____

Ward: _____

Introduction: This instrument is divided into two parts. Part 1 is related to your personal information. Part 2 is related to your perception of patients' information needs in perioperative care. One open-ended question is asked to identify unlisted information that your patients may need.

Part 1: Assessment of Demographic Data

Instruction: Please check "√" or write in the appropriate sections.

1. Gender

1. Female 2. Male

2. Age _____ years old.

3. Marital status

1. Single 2. Married 3. Widowed 4. Divorced

4. Race

1. Malay 2. Chinese 3. Indian 4. Others _____

5. Religion

1. Islam 2. Christian 3. Hindu 4. Buddhist

5. Others _____

6. Level of Education

1. Basic nursing certificate 2. Diploma in Nursing 3. Bachelor degree

4. Master degree 5. Doctorate degree

7. Have you attended any post basic course?

1. Yes 2. No

If yes, please specify:

No	Items	Rating of Patients' Level of Information Needs						Time Information Needed		
		1	2	3	4	5	N/A	Before surgery	During surgery	After surgery
	How much do your patients need to know about the following information:									
49	Observing and reporting to you if your patients feel there will be something wrong (e.g. having fever, pain, swelling, and smelling from the wound, etc).									
50	Taking care of their surgical wound (e.g. to keep the wound dry and clean).									

Additional Question

Instruction: Please answer the following question by writing on the given space.

1. Do you think that your patients may need any other information that are not listed on the above 50 items questionnaire?

If so, please specify:

Thank you for your cooperation

APPENDIX E

EXPERT OF CONTENT VALIDITY INDEX

Five experts were examined the content validity index of the Demographic Data and Patients' Information Needs in Perioperative Care as Perceived by Patients and Nurses. They are

1. Professor Zulmi Wan
Orthopedic lecturer, School of Medical Science, University Science Malaysia, Health Campus, Kubang Kerian, Kelantan
2. Assist. Prof. Dr. Chit Petpitchetchian
Surgeon, Department of Surgery, Faculty of Medicine, Prince of Songkla University, Thailand.
3. Assoc. Prof. Dr. Pranced Songwathana
Nursing Lecturer, Department of Surgical Nursing, Faculty of Nursing, Prince of Songkla University, Thailand.
4. Dr. Kanittha Naka
Nursing Lecturer, Department of Surgical Nursing, Faculty of Nursing, Prince of Songkla University, Thailand.
5. Ms. Lim Phaik Hooi
Doctoral student in nursing, International Program, Faculty of Nursing, Prince of Songkla University, Thailand.

APPENDIX F

TRANSLATION AND FINAL CHECK OF THE INSTRUMENTS

Two persons worked on the translation of the instrument: Demographic Data and Patients' information needs in perioperative care as perceived by patients and nurses. They are

1. Translation on the instruments

Puan Enikartini Binti Daud

Centre For Languages and Translation, University Science

Malaysia, Health Campus, Kubang Kerian, Kelantan

2. Final checked by

Mrs Noor Aini Binti Hussain

Nursing Lecture, Nursing Program, School of Health Science, University

Science Malaysia, Health Campus, Kubang Kerian, Kelantan.