

Enhancement of Achievement and Attitudes toward Learning of Allied Health Students Presented with Traditional versus Learning-style Instruction on Medical/Legal Issues of Healthcare

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Introduction

Precisely because individualized instruction is perceived as the key to unlocking the academic potential of each student, researchers have acknowledged that appropriate instructional planning, coupled with attention to each student's learning-style characteristics, has produced a rewarding combination.^{1,2,3} Dunn and Dunn identify learning style as "the way in which each learner begins to concentrate on, process, and retain new and difficult information."⁴ A meta-analytic validation of 42 experimental studies using the Dunn and Dunn learning-style model indicated that students whose learning styles were accommodated through compatible instructional interventions could be expected to achieve 75 percent of a standard deviation higher than those who had not had their learning styles considered.⁵ These results indicated that matching students' learning preferences with compatible instructional interventions significantly improved academic achievement.

Given the successful applications of learning style provided by many professors in higher education, there was a need for expanded research using the Dunn and Dunn model in the allied health professions.⁶ Although researchers had incorporated learning-style intervention into higher education, few investigators focused specifically on alternative instructional strategies for teaching college students new and difficult information.⁷⁻²² Even fewer researchers focused their efforts on learning styles in the allied health professions.²³⁻²⁶ Except for this author, no other researcher ventured into the arena of learning styles and health information management.^{27,28} There is a need for further research in this area. The benefits of the opportunity to employ the technique of learning styles with allied health students and in particular with health information management students are certainly worth exploring.

Purpose of Study

This researcher examined college students' learning styles and the extent to which the instructional resource known as a Contract Activity Package (CAP) taught selected topics of medical/legal issues in

healthcare, as compared with traditional teaching.²⁹ Therefore, this study compared the effect(s) of using CAPs with the effect(s) of using traditional instructional methodology on achievement-test and attitude test scores of college students enrolled in courses on medical/legal issues in healthcare to determine whether students with specific learning-style traits responded better to CAPs or to traditional instruction. For clarification purposes, Appendix 1 provides definitions of various terms used in this study.

Hypotheses

This researcher was the first to investigate the effectiveness of CAPs with an adult college student population majoring in the allied health professions. This investigator probed the following hypotheses:

H1: There will be significantly higher mean scores on tests of student achievement when course content is taught with a CAP than when course content is taught traditionally.^{30, 31}

H2: There will be significantly higher mean scores on tests of student attitudes toward instruction when course content is taught with a CAP than when course content is taught traditionally.^{32, 33}

Participants

The participants in this study were 86 allied health college students enrolled in courses on medical/legal issues of healthcare in a college of health-related professions, part of a state university located in an urban setting. Four participating classes of allied health students ($n = 86$) composed the sample for this study. Student distribution in the study was as follows: Class 1: Diagnostic Medical Imaging program ($n = 22$); Class 2: Occupational Therapy program ($n = 20$); Class 3: Physical Therapy program ($n = 15$); and Class 4: Physician's Assistant program ($n = 29$). The students ranged in age from 20 to 52, with the majority between 20 and 30 years of age. Each of the four classes comprised diverse ethnic groups. An attempt was made to include health information management students; however, this was not possible due to the limited number of individuals available. Nonetheless, beneficial results of this study have merit for all allied health students and, in particular, for health information management students. Many health information management students take joint classes with students in other allied health disciplines. The results of this study can be applied, generally speaking, to health information management students, who are an integral part of the overall healthcare team effort.

Materials

The Productivity Environmental Preference Survey (PEPS) was employed to identify the ways in which adult students preferred to learn.³⁴ This comprehensive measure identifies the following types of stimuli that make up an individual's preferences: (a) environmental, (b) emotional, (c) sociological, (d) physiological, and (e) cognitive. LaMothe, Billings, Belcher, Cobb, Nice, and Richardson conducted a study to establish the reliability and validity of the PEPS.³⁵ Four hundred baccalaureate nursing students at a large, multicampus university were administered this adult learning-style instrument. A demographic data sheet was used to obtain background information on each participant. Questions elicited information about the age, type, class level, race, hours of employment, and course failure history of each student. The major focus was to determine the suitability of the PEPS for use with baccalaureate nursing students. The objectives were to (a) establish the construct validity of the instrument; (b) establish the reliability of the instrument; (c) establish the intercorrelations of the subscales of the instrument; (d) identify differences between subpopulations of nursing students according to age, class level, sex, race, type of student, and status as student at risk (having failed a prerequisite or nursing course and being employed). Construct validity was established using factor analysis (SPSSX Factor). Construct reliability was established using SPSSX Reliability. Differences in subpopulations were identified using t-tests and ANOVA. The results established the validity and reliability of the PEPS for baccalaureate nursing students. Furthermore, the PEPS has established good reliability and predictive validity through research studies conducted in the teaching, engineering, legal, and nursing professions.³⁶⁻³⁹ The reliability and validity of the PEPS has been justified for allied health students as well. It has been employed by researchers in allied health with significant results.⁴⁰⁻⁴³

The Semantic Differential Scale (SDS) was used to measure students' attitudes toward the different instructional methods they experienced.⁴⁴ Ingham reported that the reliability coefficient of this instrument was .98 and .99 in two sessions of administration.⁴⁵

Criterion-referenced examinations consisting of multiple-choice and short-answer questions were administered. The examinations were used to test for mastery of the content.

Two different CAPs were created to present the material with an array of options for each student, and Multisensory Activity and Reporting Alternatives were used to capitalize on each individual's identified learning-style perceptual strengths. The first CAP, entitled "Patient Consent: To Touch or Not to Touch?" is Appendix 2 of this article. The second CAP, entitled "End-of-Life Issues: Your Number Is Up!" is Appendix 3. Resource Alternatives—auditory, visual, tactual, and kinesthetic—were included in the CAPs so that individuals could learn through their primary perceptual strength and reinforce content through their secondary strengths.⁴⁶

Methods/Design

At the beginning of the semester, the concept of learning styles and background research were introduced to the four participating classes. The students were administered the PEPS, from which individual profiles were then computer generated.

This study followed a counterbalanced repeated measure design. Four units of medical/legal content were taught, alternating two instructional methods. Two of these units were taught traditionally. The other two units each were taught with a different CAP. Figure one illustrates the alternating pattern of treatments among the four classes:

Figure 1. Counterbalanced Repeated Measure Design

Class	Alternating Pattern of Treatments			
Class 1	T1	C1	T2	C2
Class 2	C1	T1	C2	T2
Class 3	T1	C1	T2	C2
Class 4	C1	T1	C2	T2

In figure 1, T1 represents the first traditional treatment, C1 represents the first CAP treatment, T2 represents the second traditional treatment, and C2 represents the second CAP treatment. The same CAP was provided to all students in the class during a particular CAP treatment. Similarly, the same traditional content was provided to all students in the class during a particular traditional treatment.

An examination measuring achievement was administered to each class after each of the four units was presented. The SDS, which compared students' attitudes toward traditional versus CAP methodology, was administered to the classes after all the units were provided to all the students. Data was collected and analyzed for achievement (mastery of content presented) as well as attitude toward learning. The results were significant and offer the opportunity for allied health students to maximize their achievement and develop a positive attitude toward learning. These findings hold promise for future research to be conducted solely with health information management students of an adequate sample size to ascertain the opportunity to maximize academic potential and attitude.

Results

The following sections present results comparing differences in achievement between the CAP method and the traditional method of instruction for 86 allied health students. In addition, attitudes toward CAP instruction and traditional instruction were analyzed to determine which method elicited significantly higher attitude ratings among the students.

Achievement

Table 1 displays the means and standard deviations for all four presentations delivered with the two methods (Traditional 1, CAP 1, Traditional 2, and CAP 2) to the allied health students.

A repeated-measures ANOVA was performed on four achievement means for the allied health students in the four participating classes. The analysis yielded results based on three tests: (1) main effect of program; (2) main effect of treatment; and (3) program by treatment interaction. The following are the results of the study on achievement (Table 2).

The test of the main effect of program sought to determine whether students in the four participating allied health programs scored differently from one another on average across the four instructional presentations. The test revealed no significant difference among the programs, $F(3, 82) = 0.92, p = .43$.

The test of the main effect of treatment sought to determine whether the CAP method differed from the traditional method of instruction on average over the four participating classes. The CAP method displayed a significant p value, indicating a difference between the traditional method and the CAP method of instruction, $F(1, 82) = 528, p < .0001$. The effect size, calculated by dividing the difference of the means by the square root of the error means square, was 1.27, which indicated a very strong difference between the two methodologies.

The analysis of program by treatment interaction sought to ascertain whether the advantage of the CAP method over the traditional method was constant for students in the four program types or whether the CAP method was more effective in some of the programs than in other programs. The results indicated that the advantage of the CAP method over the traditional method of instruction was constant over the four participating programs, $p = .6019$ yielding no significance.

Table 1

Means and Standard Deviations of Four Different Presentations: CAP (C1 and C2) versus Traditional (T1 and T2)

Presentation	Mean	Standard Deviation	<i>n</i>
T1	81.90	5.23	86
C1	90.02	4.40	86
T2	82.80	4.67	86
C2	91.41	4.07	86

Table 2**Repeated Measures ANOVA**

Source	df	Mean Square	F value	Significance of F
Program	3	37.55	0.92	0.4339
Error	82	40.71		
Treatment	1	5713.00	528.16	< .0001
Treatment X program	3	6.74	0.62	0.6019
Error	82	10.81		

Attitude

To analyze the Semantic Differential Scale for all four participating allied health programs, a series of one-sample t-tests was performed for each item on the scale. These t-tests were designed to compare the mean ratings for each sample to a hypothetical value of 3, indicating a neutral preference. The Bonferroni method was used to adjust p values for multiple tests. All p values remained significant after this adjustment. The means of all items were significantly greater than 3 (Table 3). The results of each item on the SDS were: helpful: $t(85) = 27.68$, $p < .0001$; clear: $t(85) = 16.76$, $p < .0001$; energizing: $t(85) = 26.33$, $p < .0001$; calming: $t(85) = 12.74$, $p < .0001$; strengthening: $t(85) = 16.21$, $p < .0001$; relaxing: $t(85) = 15.13$, $p < .0001$; wonderful: $t(85) = 15.87$, $p < .0001$; steady: $t(85) = 16.34$, $p < .0001$; good: $t(85) = 14.84$, $p < .0001$; sharp: $t(85) = 17.85$, $p < .0001$; successful: $t(85) = 23.78$, $p < .0001$; interesting: $t(85) = 29.55$, $p < .0001$. In these findings, all items in the SDS indicated significantly more positive attitude ratings for the CAPs than for the traditional methodology.

Table 3**Semantic Differential Scale Comparing Attitude Ratings of CAPs and Attitude Ratings of Traditional Methodology for Allied Health Students ($n = 86$)**

Trait	Mean	Standard Error	p
Helpful	4.60	.058	< .0001
Clear	4.30	.077	< .0001
Energizing	4.59	.060	< .0001
Calming	4.06	.084	< .0001
Strengthening	4.17	.072	< .0001
Relaxing	4.25	.083	< .0001
Wonderful	4.19	.075	< .0001
Steady	4.22	.074	< .0001
Good	4.19	.080	< .0001
Sharp	4.26	.071	< .0001
Successful	4.45	.061	< .0001
Interesting	4.58	.053	< .0001

Conclusions

The achievement test results indicated that instruction using a CAP was significantly ($p < .0001$) more beneficial for the students than instruction using traditional methodology. This finding supported Hypothesis 1. All items of the SDS demonstrated significantly ($p < .0001$) higher student attitude test scores for the CAPs than for traditional instruction. This finding supported Hypothesis 2.

This investigation documented the differences among college students' learning styles and demonstrated statistically increased scores on achievement and attitude tests when CAPs, rather than traditional teaching, were employed. These findings are crucial, for they verify that even highly achieving and average students perform better with instructional strategies responsive to their learning styles than with dissonant instructional strategies.

Recommendations for Future Research

1. Investigate using the CAP method for instruction fulfilling continuing education requirements of practicing health care professionals. The CAP method would be an informative and interesting way to transmit knowledge to healthcare professionals. The result would be improved mastery of content, leading to more skillful healthcare professionals. Also, CAPs could help healthcare professionals develop a more positive outlook on their chosen career.
2. Explore the effectiveness of preceptors' using a CAP when educating allied health students in the clinical setting. Manuals of clinical instruction could incorporate the CAP method for specific concepts. The implication is that CAPs give the student and preceptor an innovative method of mastering clinical content in healthcare.
3. Research the effectiveness of the CAP method for educating patients on healthcare self-practices. This would provide a unique way to address educational issues for patients at all learning levels, allowing patients to grasp content concerning their care in a nonintimidating, informative, and user-friendly way.
4. Repeat this study with a larger sample, over a longer duration, and in other academic/allied health subjects to determine whether similar results occur. This study should be repeated with particular emphasis on health information management students. The implications of this innovative methodology should be far-reaching and include all disciplines on the healthcare team.

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Appendix 1: Definition of Terms

1. **Learning-style model** refers to the Dunn and Dunn model composed of 23 elements that identify the ways in which individuals are affected by their immediate environment (sound, light, temperature, seating design); emotionality (motivation, persistence, conformity, structure); sociological preferences (learning alone, in a pair, in small groups, part of a team, with an authoritative or collegial adult; variety); physiological determinants (perceptual strengths, time-of-day energy levels, intake, or mobility); and psychological inclinations (global/analytic inclinations, hemisphericity, impulsive/reflective inclinations).⁴⁷

2. A **Contract Activity Package (CAP)** is a method of instruction organized into five separate components. (Behavioral objectives, resource alternatives, activity alternatives, reporting alternatives, and multisensory resources). Each CAP incorporates a variety of instructional goals called Behavioral Objectives. These objectives prompt learners to recognize the material required for mastery and begin with a verb that coaxes participants toward action. For each behavioral objective, resource alternatives provide choices for how individual students may master the content that has to be learned.

Individuals then select from among several activity alternatives (creative applications to demonstrate mastery of the behavioral objectives) and the accompanying reporting alternatives (ways in which the participants share their completed activity alternatives with classmates) related to each of the behavioral objectives. Each activity alternative is designed to appeal to a major perceptual strength—auditory, visual, tactual, or kinesthetic—to allow the student to creatively apply the newly mastered information. Each reporting alternative requires participants to share the creative application with peers. The sharing, or reporting, reinforces the material for the individual being shown the activity. The person who created the activity alternative feels a sense of accomplishment and simultaneously reinforces the material. A list of multisensory resources that participants may use to learn the material is provided within the CAP.⁴⁸

Therefore, all CAPs include

- a) clearly stated behavioral objectives that begin with a verb (to clarify what must be learned);
- b) an analytic and global humorous title (to engage global students);
- c) multisensory activity and reporting alternatives;
- d) multisensory resource alternatives;
- e) at least three small-group techniques such as brainstorming, case study, circle of knowledge, or team learning;
- f) multiple color illustrations related to the content; and
- g) options for motivating participants.⁴⁹

3. **Traditional teaching, or traditional instruction,** refers to methods that incorporate lectures, discussions, and visual resources.⁵⁰

4. **Attitude** refers to the “student’s organized predisposition to think, feel, perceive, and behave toward a referent or a cognitive object.”⁵¹

Appendix 2: First CAP Used in Study

Patient Consent: To Touch or Not to Touch?

Consent Form

Title of study: Effects of Traditional versus Learning-Style Presentation of Course Content in Medical/Legal Issues in Health Care on the Achievement and Attitudes of College Students

Purpose: This study will focus on examining adult college students' learning styles and the extent to which the resource, "Contract Activity Package" (CAP), responds to different adults. The CAP will teach selected topics of medical/legal issues in healthcare.

Expected Duration: One semester

Procedures

1. The Dunn and Dunn Learning-Style Model will be explained by a faculty member;
2. The Productivity Environmental Preference Survey (PEPS) will be administered and individual learning-style profiles will be generated and distributed to participating students
3. Students will receive course content with traditional and the CAP versions;
4. Examinations will be administered immediately following the presentation of course content.

Perceived benefits: Improved academic achievement and attitudes toward learning new and difficult academic information.

I am a student enrolled in the (please circle one) DMI, OT, PT, PA program. I agree to participate in this study. I understand that participation is voluntary and that I may withdraw at any time.

Student's signature_____

Student's name (please print)_____

Today's date_____

Contract Activity Package (CAP)
Patient Consent: to Touch or Not to Touch?

Student's name: _____

Program: _____

Date the CAP was begun: _____

Date the CAP was completed: _____

Activity alternatives selected: _____

Reporting alternatives selected: _____

Student's post-test assessment:

Names of students who worked as a team on this CAP: _____

Dear students:

This is a Contract Activity Package (CAP) designed to teach you how to understand and use a CAP for Patient Consent: To Touch or Not to Touch? It is an individualized educational plan that will make learning more interesting and easier. You may work on this CAP alone, with a friend, or as part of a team with the small-group activities that are included.

This CAP is organized into three sections, each with a different instructional goal called a behavioral objective. For each objective, resource alternatives will provide many options through which you will be able to teach yourself what has to be learned.

To determine that you have mastered the objective, you may select from among several activity alternatives and their companion reporting alternatives cited immediately below each behavioral objective. Each of the activity alternatives is designed to appeal to a major perceptual strength—auditory, visual, tactual, or kinesthetic. Completing the activity alternatives will reinforce the knowledge you gain; teaching the material doubly reinforces what you learn and helps others too. Definitions of italicized terms are identified below.

At the end of this CAP, you will find a list of resources that will help you learn all that is required. These include journals, books, and participant-made tactile/kinesthetic materials.

By the time you complete this CAP, you should be able to:

1. identify all 10 elements of an informed consent.
2. list and describe the seven different types of consent a patient may give to receive medical and surgical treatment; and
3. identify the circumstances in which minors can, and can not, consent to medical and surgical treatment.

If you need any further assistance in working with this CAP, please do not hesitate to contact your instructor. Good luck!

Definition of Terms

1. Behavioral objectives—what you are expected to learn
2. Resource alternatives—a list of multi-sensory materials through which you can master the behavioral objectives
3. Activity alternatives—a series of choices in which you need to use the information you learn in creative ways by making something original
4. Reporting alternatives—the sharing or reporting of the creative activity you completed alone or with classmates to help you remember what you learned with the resources

Behavioral Objective 1

Identify all 10 elements of an informed consent.

Complete at least one of the activity and reporting alternatives in this section. Remember, if you need help refer to the resource list at the back of the CAP.

Activity Alternatives

1. Make a transparency outlining all 10 elements of an informed consent
2. Make an audiotape identifying all 10 elements of an informed consent
3. Create a videotape depicting a discussion on all 10 elements of an informed consent

Reporting Alternatives

1. Display your transparency on a TV projector to a group of three classmates
2. Have a small group of students listen to the tape for a review of this topic
3. Have a pair of students view the discussion and then list all 10 elements

Behavioral Objective 2

List and describe the seven different types of consent a patient may give to receive medical and surgical treatment. Complete at least one activity and reporting alternative.

Activity Alternatives

1. Make an audiotape identifying the five different types of patient consent
2. Use the chapter on CAPs in the text, *Teaching Secondary Students Through Their Individual Learning Styles* by Drs. Rita and Kenneth Dunn as a reference. Construct task cards describing seven different types of consent
3. Role play Dr. Right explaining to patient, “Danny the Difficult” the seven different types of consent
4. Form a group of students and listen to descriptions of each tape
5. Decide if all students in this group agree on the accuracy of the tape recording

Reporting Alternatives

Form a group of five students and listen to the tape. Decide if all students in this group agree on the accuracy of the tape recording

1. Test the knowledge of students using the task cards on this topic
2. Have at least two teams act out the scenario. Let a jury select the best performances

Behavioral Objective 3

Identify the circumstances in which minors can, and cannot, give consent for medical and surgical treatment.

Complete at least one activity and reporting alternative.

Activity Alternatives

1. Prepare a speech explaining how when a minor can and cannot consent. Read the speech into a tape recorder
2. Design a poster outlining the circumstances in which a minor can and can not consent for medical and surgical treatment
3. Role play a scenario in which a doctor explains to a parent why their daughter is allowed to consent to an abortion
4. Videotape a conversation between two fellow students explaining the circumstances under which nine-year old Sally can have a blood transfusion without her parent’s consent

Reporting Alternatives

1. Have a small group of students listen to the speech on tape. Ask them to illustrate the ways.
2. Share with a classmate; display the poster in a prominent location in classroom for all to view
3. Act out this scenario in front of at least six other students
4. Show the film to other students for suggestions

Small-Group Techniques

Begin with the required small-group technique, number-one—team learning, and then choose at least one of the other following small-group techniques.

Small-Group Technique One

Team learning is an excellent small-group technique for learning new material. To begin, form a group of four or five students and either arrange seats in a circle or find any seating that is comfortable. When everyone feels comfortable, elect one member to act as recorder, the person who writes the group’s

responses. Use humorous “selection” procedures to elect a recorder, i.e. the student with the longest hair or wearing the most of the color blue.

Then read the following information describing the seven different types of patient consent, or, listen to the audiotape of it. Then, as a group, answer the questions posed on the next page. Any member may help others on the same team, but all effort must be concentrated within the group and the group must come to a consensus. Ten minutes are allowed for the completion of the team learning. The facilitator then will ask each recorder, in turn, the answers to the question, and will write these answers on the board or overhead projector transparency.

Members

1. _____
 2. _____
 3. _____
 4. _____
 5. _____
- Recorder _____

Types of Consent

General consent—Executed at the time of a patient’s admission to a facility. This type of consent records the patient’s permission for routine services, general diagnostic procedures, medical treatment(s), and the everyday handling of the patient.

Special consent—This consent is executed when a proposed treatment program may involve some unusual risks to the patient. A list of procedures and treatments requiring special written consent should be maintained. This form should be signed, dated, and witnessed at the time the physician explains to the patient the procedure(s) he plans to perform.

Written informed consent—This is the preferred form of consent to be given by the patient. It is proof of the patient’s wishes. Physicians have a legal duty to inform their patients of any procedures the healthcare professional is ordering. This written form provides evidence of informed consent. It includes all the elements the physician discloses to the patient concerning any treatment(s) or procedure(s) he/she intends to perform.

Oral informed consent—This type of verbal consent, if proven, is as binding as written consent. There is no legal requirement that a patient’s consent be in writing; however, oral consent is more difficult to corroborate.

Implied consent—This is a voluntary consent to seek medical treatment. A patient who walks into a doctor’s office seeking medical treatment(s) is doing so voluntarily.

Withdrawn consent—Any consent freely given may be freely withdrawn or modified at any time.

No consent—A patient may choose not to have any medical treatment(s) or procedure(s) performed by not giving consent. A battery (unlawful touching) is committed if a healthcare professional renders care to patients without their consent. Furthermore, no consent is necessary from the patient in an emergency situation; i.e. a comatose patient who cannot give consent where no next of kin is available to obtain a proper consent. Emergency situations are defined as life-threatening. If a patient refuses to consent, for any reason, then a notation must be written in the medical record.

Complete the following questions/exercise on the next page as a group allowing your recorder to write the group’s answers.

1. What does a general consent to treatment mean?
2. Describe the meaning of a special consent to treatment?
3. Why is a written informed consent the preferred form of consent to be obtained from the patient?

Which elements does this form of consent include?

4. Describe oral informed consent. Why is this the least preferred form of consent to treatment?
5. What is implied consent? Give one example of this.
6. Can a patient who gives consent for treatment withdraw that consent at any time? What is this type of consent called?
7. Describe a situation in which treatment may be rendered by a healthcare professional without a patient's consent?
8. Write a script of a hospital nurse committing a battery on a patient.

Small-Group Technique Two

Circle of knowledge—This is a small-group technique that you may select to help you learn all 10 elements of an informed consent. One day your patients will be happy that you did.

Procedure—Position four to five chairs into several small separated circles about the room. One student in each group should be appointed or elected as the group's recorder. (Use a humorous method of selection, e.g. the person with the curliest hair, the most of the color red, and so forth). A single question is posed, one that elicits many possible answers. Each circle of knowledge team will respond to the same question simultaneously. One member in each group is designated as the first to begin, providing one answer at a time in rotation. Then answers are provided by the next member in the Circle rotating as many times as possible. The recorder writes each participant's responses during a predetermined time period. At the end of this period, the responses of all groups can be compared and the group with the most correct responses wins. Points will be deducted for incorrect or duplicate answers.

Circle members:

1. _____
2. _____
3. _____
4. _____
5. _____

Recorder _____

Circle of knowledge—Identify as many of the 10 elements of an informed consent as you can. There is a five minute and 15 second time limit.

1. _____
2. _____
3. _____
4. _____
5. _____
6. _____
7. _____
8. _____
9. _____
10. _____

Group Analysis—Small-Group Technique Three

Group members' names:

1. _____ 2. _____
3. _____ 4. _____

Review the attached case for discussion and analysis. Answer the following questions as a group:

1. Do you agree with the court's decision? Explain.
2. Under what circumstances do you believe the state should interfere with religious beliefs when considering treatment for a minor child (e.g. the administration of blood)?
3. Under what circumstances do you think an adult should have the right to refuse treatment?

Resource Alternatives

Texts

- Mancini, G.R., and Gale, A.T. (1981). *Emergency Care and the Law*. Aspen: Rockville, Maryland.
 Miller, R.D. (1986). *Problems in Hospital Law*. Aspen: Rockville, Maryland.
 Pozgar, G.D. (1999). *Legal Aspects of Health Care Administration*. Aspen Publications: Gaithersburg, Maryland.
 Pozgar, G.D., & Pozgar, N.S. (1999). *Case Law in Health Care Administration*. Aspen Publications: Gaithersburg, Maryland.
 Roach, W.H. (1998). *Medical Records and the Law*. Aspen Publications: Gaithersburg, Maryland.
 Rosoff, A.J. (1981). *Informed Consent: A Guide for Health Care Providers*. Aspen: Rockville, Maryland.
 Southwick, A.F. (1978). *The Law of Hospital and Health Care Administration*. Health Administration Press: University of Michigan.

Journals

- Journal of the American Academy of Physician Assistants*
Journal of the American Health Information Management Association
Journal of the American Hospital Association
Journal of the American Medical Association
Journal of the American Nursing Association
Journal of the American Society of Law and Medicine
Journal of the Occupational Therapy Association
Journal of the Physical Therapy Association

Equipment

- Camcorder
 Microcomputer laboratory
 Overhead projector
 Tape recorder

Tactual/Kinesthetic Materials

- Electroboard
 Pic-a-hole
 Floor game

Student name: _____

Patient consent: To Touch or Not To Touch
 Post-test assessment

Part one

Multiple choice: Select the best response to the question. (70 points)

1. The voluntary agreement by a person in the possession and exercise of sufficient mentality to make an intelligent choice to allow something proposed by another is:

- a). consent
- b). implied consent
- c). express consent
- d). none of the above

2. Express consent is:

- a). implied
- b). verbal
- c). written
- d). b and c

3. Touching another without authorization to do so could be considered:

- a). touching
- b). battery
- c). assault
- d). implied
- e). b and d
- f). none of the above

4. It is preferable that a patient's consent be procured by the:

- a). chiefly orderly
- b). nursing supervisor
- c). administrator
- d). private duty nurse
- e). physician
- f). none of the above

5. Consent that requires that a patient have a full understanding of that to which he or she has consented is:

- a). brief
- b). express
- c). implied
- d). informed
- e). written
- f). verbal

6. Consent in cases in which immediate action is required to save an unconscious patient's life or to prevent permanent impairment of a patient's health is referred to as:

- a) written
- b) express
- c) implied
- d) verbal
- e) informal
- f) a and d

7. The preferred method of obtaining consent is:

- a) express
- b) written
- c) implied
- d) verbal

8. The burden of establishing proof on a complaint of lack of informed consent is on the:

- a) defendant
- b) parent
- c) physician
- d) plaintiff

9. In the absence of statutory protection, a procedure performed despite an individual's refusal to consent would constitute:

- a) false imprisonment
- b) battery
- c) fraud
- d) libel

10. A patient's refusal to consent to treatment, for any reason, religious or otherwise, should be noted in the:

- a) medical record
- b) incident report
- c) business office
- d) QA report

Part II: Short answers: Answer all questions (30 points)

1. Identify all 10 elements of an informed consent.
2. List and describe the seven different types of consent a patient may give to receive medical and surgical treatment.
3. Identify the circumstances in which minors can and can not consent for medical and surgical treatment.

Fall, 2000
Semantic Differential Scale

Name _____

Program _____

Topic Patient Consent: To Touch or Not To Touch

Directions: When learning about the topic, Patient Consent: To Touch or Not To Touch through a CAP—as compared to learning traditionally (through lectures and readings)—the CAP was: (please check only one of the five spaces on each line.)

Neutral

helpful _____ not helpful

confused _____ clear-minded

energetic _____ tired

nervous _____ calm

strong _____ weak

tense _____ relaxed

wonderful _____ terrible

shaky _____ steady

bad _____ peaceful

dull _____ sharp

successful _____ unsuccessful

In your own words, please give a short explanation of why you feel as you do about learning with a CAP rather than with lectures and readings alone.

Appendix 3: Second CAP Used in Study

End-of-Life Issues: Your Number Is Up

Consent Form

Title of study: Effects of Traditional versus Learning-Style Presentations of Course Content in Medical/Legal Issues in Health Care on the Achievement and Attitudes of College Students

Purpose: This study will focus on examining adult college students’ learning styles and the extent to which the resource, “Contract Activity Package” (CAP), responds to different adults. The CAP will teach selected topics of medical/legal issues in healthcare.

Expected duration: One semester

Procedures:

1. The Dunn and Dunn Learning-Style Model will be explained by a faculty member;
2. The Productivity Environmental Preference Survey (PEPS) will be administered and individual learning-style profiles will be generated and distributed to participating students;
3. Students will receive different but equivalent in difficulty course content with both traditional and the CAP versions;
4. Examinations will be administered immediately following each presentation of course content.

Perceived benefits: Improved academic achievement and attitudes toward learning new and difficult academic information.

I am a student enrolled in the (please circle one) DMI, OT, PT, PA program. I agree to participate in this study. I understand that participation is voluntary and that I may withdraw at any time.

Student’s signature _____
 Student’s name (please print) _____
 Today’s date _____

Contract Activity Package (CAP): End-of-Life Issues: Your Number Is Up!

Student’s name: _____
 Program: _____
 Date this cap is begun: _____
 Date this cap is completed: _____
 Activity alternatives selected: _____
 Reporting alternatives selected: _____

Student’s post-test assessment: names of students who worked as a team on this CAP:

Dear students:

This is a Contract Activity Package (CAP) designed to teach you how to understand and use a CAP to master End-of-Life Issues: Your Number Is Up! This is an individualized educational plan that should make learning more interesting and easier. You may work on this CAP alone, with a classmate, or as part of a team with the small-group activities that are included.

This CAP is organized into three sections, each with a different instructional goal called a behavioral objective. For each objective, resource alternatives will provide many options through which you will be able to teach yourself the content that has to be learned.

To determine that you have mastered the objective, you may select from among several activity alternatives and their companion reporting alternatives cited immediately below each behavioral objective. Each of the activity alternatives is designed to appeal to a major perceptual strength—auditory, visual, tactual, or kinesthetic. When you complete the activity alternatives, you will be reinforcing the knowledge you gain; when you teach the material to a classmate, you will be reinforcing what you learn and help others too. Definitions of italicized terms are identified below.

At the end of this CAP, you will find a list of resources that will help you learn all that is required. These include journals, books, and participant-made tactile/kinesthetic materials.

By the time you complete this CAP, you should be able to:

1. List and define the four recognized forms of euthanasia
2. Describe the following five legislative responses to end-of-life issues:
 - (a) patient self-determination act
 - (b) substituted judgment/guardianship
 - (c) durable power of attorney
 - (d) health care proxy
 - (e) living will
3. Identify all the components of do not-resuscitate (DNR) orders

If you need further assistance in working with this CAP, please do not hesitate to contact your instructor. Good luck.

Definition of Terms

1. Behavioral objectives—what you are expected to learn
2. Resource alternatives—a list of multi-sensory materials through which you can master the behavioral objectives.
3. Activity alternatives—a series of choices in which you need to use the information you learn in creative ways by making something original.
4. Reporting alternatives—the sharing or reporting of the creative activity you completed alone or with classmates to help you remember what you learned from the resources.

Behavioral Objective 1

List and define the four recognized forms of euthanasia.

Complete at least one of the activity and reporting alternatives in this section. Remember, if you need help refer to the resource list at the back of the CAP.

Activity Alternatives

1. Make a transparency outlining all four recognized forms of euthanasia. Use four different color markers to do this activity.
2. Make an audio tape of the four recognized forms of euthanasia. Record this material in a foreign language and then translate it into English
3. Create a videotape of one student naming the four recognized forms of euthanasia and another student defining the meaning of each

Reporting Alternatives

1. Display your transparency on a projector for a least three classmates to view
2. Have a small group (three to four students) listen to the tape for review of the topic
3. Have a group of four students view this tape and illustrate what they learned from it

Behavioral Objective 2

Describe the following five legislative responses to end-of-life issues: Patient Self-Determination Act, substituted judgment/guardianship, durable power of attorney, healthcare proxy, and living will.

Complete at least one activity and reporting alternative.

Activity Alternatives

1. Make an audio tape depicting the following scenario: you are a judge describing to a jury what the five legislative responses to end-of-life issues mean
2. Create a game of "Who Wants to be a Millionaire" by answering questions on at least five legislative responses to end-of-life issues
3. Design a multi-colored poster illustrating at least five legislative responses to end-of-life issues

Reporting Alternatives

1. Form a group of six students and listen to the tape. Decide if all group members agree on the accuracy of the tape.
2. Invite a group of four students to be the audience
3. Display the poster in the front of the room for all to view

Behavioral Objective 3

Identify all the components of do not resuscitate (DNR) orders.

Complete at least one activity and reporting alternative.

Activity Alternatives

1. Prepare a speech as chief resident of a hospital to all house staff on the importance of all the components of DNR orders. Read the speech into a tape recorder
2. Role play a professor in a medical school explaining to his class the components of DNR orders
3. Create a videotape of angry parents confronting the doctor who did not comply with a DNR request for their terminally ill son

Reporting Alternatives

1. Have a group of students listen to the speech on tape and answer a short survey on the components on DNR orders
2. Act out this scenario in from on at least six other students
3. Have a pair of students view the confrontation and make up a list of all the components of DNR orders

Small Group Techniques

Begin with the required small group technique, number one—team learning, and then choose at least one of the other following small-group techniques.

Small Group Technique One

Team Learning is an excellent small-group technique for learning new material. To begin, form a group of four or five students and either arrange seats in a circle or find any seating that is comfortable. When everyone is ready, elect one member to act as recorder, the person who writes the group's responses. Use humorous "selection" procedures for electing a recorder, i.e., "the student with the longest hair" or "whoever is wearing the most of the color blue".

Then read the following information describing the five legislative responses to end of life issues or listen to the audiotape of it. Then, as a group, answer the questions posed on the next page. Any member may help others on the same team, but all effort must be concentrated within the group and the group must come to a consensus. 10 minutes are allowed for the completion of the team learning. The facilitator then will ask each recorder, in turn, the answers to the question, and will write their answers on the board or overhead projector transparency.

Members

1. _____
2. _____
3. _____
4. _____
5. _____

Recorder _____

Five Legislative Responses to End of Life Issues

1. **Patient Self-Determination Act**—As a result of the implementation of this law in 1990, healthcare organizations participating in the Medicare and Medicaid reimbursement programs must deal with patients' rights regarding life-sustaining decisions and other advanced directives. Healthcare organizations have a responsibility to explain to patients, staff, and families that patients do have a legal right to direct their own medical and nursing care as it corresponds to existing state law, including right-to-die directives. When a person is no longer competent to exercise his or her right to self-determination, that right still exists, but the decision is delegated to a surrogate decision maker. Those organizations that do not comply with a patient's directives or those of a legally authorized decision maker, as chosen by the patient, are exposing themselves to a lawsuit.

2. **Substituted Judgment/Guardianship**—Guardianship is a legal mechanism by which the court declares a person incompetent and appoints a guardian. The court transfers the responsibility for managing financial affairs, living arrangements, and medical care decisions to the guardian. The right to refuse medical treatment on behalf of an incompetent person is not limited to legally appointed guardians but may be exercised by health care proxies or surrogates such as close family members or friends. Designation of a proxy must be made in writing.

3. **Durable Power of Attorney**—Power of attorney is a legal device that permits one individual known as the principal to give to another, called the attorney-in-fact, the authority to act on his or her behalf. The attorney-in-fact is authorized to take care of banking and real estate affairs, incur expenses, pay bills, and handle legal matters for a specified period of time. If the principal becomes comatose or mentally incompetent, then the power of attorney expires, just as if the principal were to die. Because a power of attorney is limited by the competence of the principal, some states have authorized a special legal device for the principal to express intent concerning the durability of the power of attorney, to allow it to survive disability or incompetency. The durable power of attorney need not delineate desired medical treatment specifically, but must indicate the identity of the principal's attorney-in-fact and that the principal has communicated his or her health care wishes to the attorney-in-fact. Durable power of attorney is drawn up by an attorney in a state where the client resides.

4. **Healthcare Proxy**—This proxy allows a person to appoint a healthcare agent to make treatment decisions in the event he or she becomes incapacitated and unable to make decisions for him- or herself. The agent must be aware of the patient's wishes regarding nutrition and hydration in order to be allowed to make a decision concerning the withholding or withdrawing of treatments. The appointed agent knows

about and interprets the expressed wishes of, the patient and then make decisions about the medical care and treatment to be administered or refused.

5. **Living Will**—A living will or directive, is the instrument or legal document that describes those treatments an individual wishes or does not wish to receive should he or she become incapacitated and unable to make decisions for himself or herself. A living will allows a person, when competent, to inform caregivers, in writing, of his or her wishes with regard to withholding and withdrawing life-supporting treatment, including nutrition and hydration. It provides guidance to health care professionals on patients' wishes for treatment, provides legally valid instructions about treatment, and protects patients' rights. The living will should be signed and dated by two witnesses who are not blood relatives or beneficiaries of property. It is discussed with the patient's physician and a copy is placed into the patient's medical record and one copy is given to the designated individual. The first living will act was enacted in the state of California.

Complete the following questions/exercise on the next page as a group, allowing your recorder to write the group's answers.

1. What is the Patient's Right to Self-Determination Act?
2. What does substituted judgment/guardianship mean?
3. Differentiate between power of attorney and durable power of attorney.
4. Who can become a healthcare agent and what responsibilities does that individual have with respect to a patient?
5. What is a living will and how does it differ from a healthcare proxy?
6. Role play a scenario in which an elderly mother discusses her healthcare wishes with her daughter and wants to execute a living will.

Small Group Technique One

Circle of knowledge—this is a small-group technique that you may select to help you learn all the components of do not resuscitate (DNR) orders. One day your patients will be happy that you did.

Procedure—position four to five chairs into several small, separated, circles about the room. One student in each group should be elected as the group's recorder. (Use a humorous method of selection, e.g. the person with the: (a) curliest hair or (b) most of the color red). A single question is posed, one that elicits many possible answers. Each circle of knowledge team will respond to the same question simultaneously, but quietly so that others do not hear. One member in each group is designated as the first to begin and provides one answer at a time in rotation. Then answers are provided by the next member in the circle, rotating throughout the circle as many times as possible within the short time frame. The recorder writes each participant's responses during that predetermined time period. At the end of the period, the responses of all groups can be compared and the group with the most correct responses wins. Points will be deducted for incorrect or duplicate answers.

Circle members:

1. _____
 2. _____
 3. _____
 4. _____
 5. _____
- Recorder _____

Circle of Knowledge: Identify as many components of the DNR orders as you can. There is a six minute and 10 second time limit.

1. _____
2. _____
3. _____
4. _____
5. _____
6. _____
7. _____

Group Analysis—Small-Group Technique 3

Group members' names:

1. _____
2. _____
3. _____
4. _____

Resource Alternatives

Texts

- Mancini, G.R., and Gale, A.T. (1981). *Emergency Care and the Law*. Aspen: Rockville, Maryland.
- Miller, R.D. (1986). *Problems in Hospital Law*. Aspen: Rockville, Maryland.
- Pozgar, G.D. (1999). *Legal Aspects of Health Care Administration*. Aspen Publications: Gaithersburg, Maryland.
- Pozgar, G.D., & Pozgar, N.S. (1999). *Case Law in Health Care Administration*. Aspen Publications: Gaithersburg, Maryland.
- Roach, W.H. (1998). *Medical Records and the Law*. Aspen Publications: Gaithersburg, Maryland.
- Rosoff, A.J. (1981). *Informed Consent: A Guide for Health Care Providers*. Aspen: Rockville, Maryland.
- Southwick, A.F. (1978). *The Law of Hospital and Health Care Administration*. Health Administration Press: University of Michigan.

Journals

- Journal of the American Academy of Physician Assistants*
- Journal of the American Health Information Management Association*
- Journal of the American Hospital Association*
- Journal of the American Medical Association*
- Journal of the American Nursing Association*
- Journal of the American Society of Law and Medicine*
- Journal of the Occupational Therapy Association*
- Journal of the Physical Therapy Association*

Equipment

- Camcorder
- Microcomputer laboratory
- Overhead projector
- Tape recorder

Tactual/Kinesthetic Materials

- Electroboard
- Pic-A-Hole
- Board Game

Student name: _____

End-of-Life Issues: Your Number is Up!
Post-test Assessment

Part One

Multiple choice: select the best response to the question. (70 points)

1. The act or practice of painlessly putting to death a person suffering from an incurable condition is:
 - a) murder
 - b) euthanasia
 - c) misdemeanor
 - d) informed consent

2. In the healthcare setting, the commission of an act (other than the removal or withholding of treatment) that results in death is sometimes referred to as:
 - a) informed consent
 - b) passive euthanasia
 - c) active euthanasia
 - d) negligence

3. The removal of the artificial means of life-saving treatment (such as a respirator, allowing the patient diagnosed as terminal to die a natural death, is sometimes referred as:
 - a) passive euthanasia
 - b) active euthanasia
 - c) mercy killing
 - d) informed consent

4. The removal of nasogastric feeding tubes from a mentally competent patient to legally hasten death is an example of:
 - a) informed consent
 - b) passive euthanasia
 - c) active euthanasia
 - d) aiding suicide

5. An order written by a physician and placed on the medical chart of a patient, indicating that in the event of a cardiac or respiratory arrest, no resuscitation measures should be employed to revive the patient is a(n):
 - a) informed consent order
 - b) euthanasia order
 - c) DNR order
 - d) active euthanasia order

6. The first state to enact a living will act was:
 - a) New York
 - b) Oregon
 - c) New Mexico
 - d) California

7. Euthanasia originated from the Greek word euthanatos meaning:

- a) good death
- b) suicide
- c) happy life
- d) manslaughter

8. A living will must contain all the following except:

- a) signatures of two witnesses
- b) date of execution
- c) designated individual
- d) next of kin

9. The federal act of 1990 that went into effect on December 1, 1991 and provides that patients have a right to formulate advanced directives and to make decisions regarding their healthcare was the:

- a) Patient Self-Determination Act
- b) Right to Die Act
- c) Euthanasia Act
- d) Substituted Judgment Act

10. A legal device that permits one individual known as the principal to give to another person called the attorney-in-fact the authority to act on his or her behalf is the:

- a) durable power of attorney
- b) Patient Self-Determination Act
- c) agent's living will
- d) appointed healthcare proxy

Part Two: Short answers: Answer all questions (30 points)

1. List and define the four recognized forms of euthanasia.
2. Describe the following five legislative responses to end-of-life issues: patient self-determination act; substituted judgment/guardianship, durable power of attorney, healthcare proxy, and living will.
3. Identify all the components of do not resuscitate orders.

Fall, 2000
 Semantic Differential Scale

Name _____

Program _____

Topic End of Life Issues: Your Number is Up!

Directions: When learning about the topic, “End of Life Issues: Your Number is Up,” through a CAP, as compared to learning traditionally (through lectures and readings) the CAP was: (Please check only one of the five spaces on each line.)

Neutral

helpful _____ not helpful

confused _____ clear-minded

energetic _____ tired

nervous _____ calm

strong _____ weak

tense _____ relaxed

wonderful _____ terrible

shaky _____ steady

bad _____ peaceful

dull _____ sharp

successful _____ unsuccessful

In your own words, please give a short explanation of why you feel as you do about learning with a CAP rather than with lectures and readings alone.

Appendix A

**Downstate Medical Center
State University Hospital**

Consent To Treatment

NAME

MR #

N.S.

SERVICE/DOCTOR

Affix Label or Complete

Date _____ Time _____ AM
PM

Patient _____
(Last Name) (First) (Middle Initial)

Age at Last Birthday _____ (Patients under 18 years of age to complete Supplement For
Persons under Age 18 Intending to Consent For Themselves)

1. I, _____ knowing that I require hospital care or a course of treatment, consent to diagnostic and treatment procedures by State University of New York – Downstate Medical Center physicians or assistants or persons they designate.
2. I am aware that the practice of medicine is not an exact science. No guarantees have been made to me about the benefits or results of procedures and treatments authorized above.
3. I authorize University Hospital to use or dispose of any tissues or specimens resulting from the procedures authorized above.
4. I further consent to the use of confidential information for medical research and education by State University of New York – Downstate Medical Center and their physicians; at the same time the State University of New York – Downstate Medical Center and their physicians are to protect my identity.
5. I have read and understood this form, and I understand that I may ask for further explanations at any time.

Date _____ Signature of Patient _____

If consenting party is other than patient:

(State Relationship to Patient)

Witnesses:

(Signature)

(Address)

(Signature)

(Address)

Appendix B

**University Hospital
State University of New York
Health Sciences Center
at Brooklyn**

Consent to diagnostic
Operative or special Procedure

Name
MR #
N.S.
Service/doctor

Affix Label or Complete
AM
PM

Date _____ Time _____

Patient _____
(Last Name) (First) (Middle Initial)

Age at Last Birthday _____ (Patients under 18 years of age to complete Supplement For
Persons under Age 18 Intending to Consent For Themselves)

1. I hereby give authorization and consent for the performance upon _____
(state "myself" or name of Patient) of the
following operation or procedure _____ to be performed by
Dr. _____ and whomever he/she may designate as his/her assistants.
(Name of Physician)

2. The nature, intended purposes, reasonable risks, consequences and alternative methods of treatment have been explained and discussed with me by Dr. _____, and I give this permission
(Name of Physician) with full knowledge and understanding thereof.

3. I further consent to the administration of anesthesia and acknowledge that the probable anesthesia has been identified to me. The reasonable risks, complications and alternative anesthetics or anesthetic procedures have been explained to me. There are no anesthetics that I have reason to believe are harmful to me except _____ I acknowledge that no guarantee has been given to
(Indicate exception to none)
me about the effects of the anesthetic used. I further consent to the supervision of my anesthesia care by a qualified anesthesiologist.

4. I have been advised of the serious nature of the operation or procedure and have been advised that if I desire a further and more detailed explanation of the foregoing, as well as information about more remote risks or complications of the above listed operation/procedure, such explanation will be given to me.

5. I do not desire any further or additional explanation.

6. I also consent to the performance of procedures in addition to or different from those described above, arising from conditions which are presently unforeseen or believed unlikely, if the above-named doctor or those under his/her direction, in their best professional judgment, consider it necessary or advisable during the course of the operation or procedure. Under no circumstances, however, do I consent to

(State nature and extent of procedure for which consent is not given)

7. I acknowledge that I have received no guarantees about the benefits or results of this operation or procedure.

8. In the interest of medical education, I consent to observers being admitted during this operation, treatment or procedure to the operating room.

9. I consent to the disposal by hospital authorities of any tissues or body parts which may be removed.

10. I consent to the administration of such drugs, infusions, transfusions of blood or blood components, or any other treatment deemed necessary or desirable in the judgment of the above-named doctor or those acting under his/her direction.

11. I acknowledge that I have read this entire document and that I fully understand it and that all blank spaces have been either completed or crossed off prior to my signing.

Date _____

 Signature of patient

If consenting party is other than patient:

 (State Relationship to Patient)

Witnesses:

 Signature

 Signature

PHYSICIAN STATEMENT

I have discussed the nature and purpose of the above operation. Treatment(s) or procedure, and the associated risks, consequences and available alternatives, with the person signing above, and I am satisfied that he/she understands them.

 Signature of Physician Providing Explanation M.D.

Appendix C

**Downstate Medical Center
State University Hospital**

**Consent for Cardiac Catheterization
Angiography and
Selective Coronary Angiography**

Name _____

MR # _____

N.S. _____

Service/Doctor _____

Affix Label or Complete _____

Date _____

Time _____ PM AM

Patient _____
(Last Name) (First) (Middle Initial)

Age at Last Birthday _____ (Patients under 18 years of age to complete Supplement For
Persons under Age 18 Intending to Consent For Themselves)

1. I hereby give authorization and consent for the performance upon _____
(State "myself" or name of Patient)
of Cardiac Catheterization, Angiography, and Selective Coronary Angiography, to be performed by Dr.
_____ and whomever he/she may designate as his/her assistants.
(Name of Physician)

2. It has been stated to me that during cardiac catheterization and selective angiography plastic tubes will be inserted into my veins and arteries and advanced into my heart. Dye will then be injected through the tubes and enter my body in order to act as a material to show up on X-rays. It has been further explained to me that this entails certain risks which include death (in rare instances), cardiac arrest, heart attack, stroke, disturbances of cardiac rhythm, blood clots in various organs of the body, injury to the arterial or vein walls, bleeding, injury to nerves or limbs, loss of pulsation in limbs due to arterial obstruction, loss of part or all of a limb, persistent pain in the limbs, paralysis and allergic reaction to dye.

3. I further consent to the administration of anesthesia and acknowledge that the probable anesthesia has been identified to me. The reasonable risks, complications and alternative anesthetics or anesthetic procedures have been explained to me. There are no anesthetics that I have reason to believe are harmful to me except _____, I acknowledge that no guarantee has been given to
(Indicate exception to none)
me about the effects of the anesthetic used. I further consent to the supervision of my anesthesia care by a qualified anesthesiologist.

4. I have been advised of the serious nature of the treatment(s) and have been advised that if I desire a further and more detailed explanation of the foregoing, as well as information about more remote risks or complications of the above listed operation/procedure, such explanation will be given to me.

5. I do not desire any further or additional explanation.

6. I also consent to the performance of procedures in addition to or different from those described above, arising from conditions which are presently unforeseen or believed unlikely, if the above-named doctor or those under his/her direction, in their best professional judgment, consider it necessary or advisable during the course of the operation or procedure. Under no circumstances, however, do I consent to

(State nature and extent of treatment(s) for which consent is not given)

7. I acknowledge that I have received no guarantees about the benefits or results of this treatment.

8. In the interest of medical education, I consent to observers being admitted during this operation, treatment or procedure to the operating room.

9. I consent to the disposal by hospital authorities of any tissues or body parts which may be removed.

10. I consent to the administration of such drugs, infusions, transfusions of blood or blood components, or any other treatment deemed necessary or desirable in the judgment of the above-named doctor or those acting under his/her direction.

11. I acknowledge that I have read this entire document and that I fully understand it and that all blank spaces have been either completed or crossed off prior to my signing.

Date _____

 Signature of patient

If consenting party is other than patient:

 (State Relationship to Patient)

Witnesses:

 Signature

 Signature

PHYSICIAN STATEMENT

I have discussed the nature and purpose of the above operation. Treatment(s) or procedure, and the associated risks, consequences and available alternatives, with the person signing above, and I am satisfied that he/she understands them.

 Signature of Physician Providing Explanation M.D.