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## Introduction

# Improving Practitioners' Decision Support Skills

## Faculty Developers

**Annette O'Connor, RN PhD**  
Emeritus Professor, University of Ottawa  
Visiting Scholar, The Dartmouth Institute for  
Health Policy and Clinical Practice, NH, USA

**Dawn Stacey, RN PhD**  
Associate Professor, University of Ottawa

**Mary Jane Jacobsen, RN MEd**  
Adjunct Professor, University of Ottawa

## Target Audience

The Ottawa Decision Support Tutorial (ODST) is intended for health professionals and others involved in counselling and supporting people making decisions about health or social situations.

## Participant Objectives

Upon completing the ODST, participants should be able to:

- describe concepts of decision support
- identify complex decisions requiring decision support
- explain how to assess patients' decisional needs
- tailor decision support to patients' needs
- explain how to use patient decision aids
- discuss how to evaluate decision support interventions

## How to Proceed Through the ODST

1. Complete the 10 Sections (1 to 2 hours).  
The first 9 sections are followed by self-assessment tests that provide you with feedback on your comprehension; tests may be reviewed or retaken as often as you wish. Section 10 is a case study that shows an example of providing decision support incorporating a patient decision aid. If you do not complete the ODST in one sitting, you can log back in at any time and resume the ODST where you left off.
2. Write the final quiz to obtain a certificate.  
When you have completed the ODST, there is a final quiz covering all of the topics. Participants achieving 75% or higher on their first attempt receive a certificate of completion. (Click on the link to your "Certificate of Completion" on the Final Test page, and print a copy of the certificate for your records.)
3. Share your views of the ODST.  
At the end of the tutorial, you will be offered a survey to provide feedback. This survey is optional. If you have any questions or comments please contact [odst@ohri.ca](mailto:odst@ohri.ca).



## Other helpful hints

Download a copy of the text. You can download and print a PDF version of this tutorial (178 KB).

Navigate as you go. There are links in the left-hand menu to go to any section or any quiz in the ODST. The menu items on the left of the screen will tell you where you are in the ODST. You can return to the previous page by clicking on the Back button or go forward by clicking on the Next button at the bottom of each page. The Logout button ends your session and returns you to the login page.

## Privacy Statement

Any information collected is for the purpose of evaluating the ODST and will be kept confidential. If you are taking the ODST for credit, your grade on the final test will be forwarded to your instructor.

## Use and effectiveness of the ODST

The ODST has been evaluated in: (a) two randomized trials with nurses practicing in health call centres and in oncology/palliative care, and (b) one pre-/post-test study of health care professionals working at a cancer helpline [ Murray 2010, Stacey 2006, Stacey 2008a ]. The ODST significantly improves knowledge of decision support. When it is combined with a skills-building workshop, it improves the quality of decision support provided to simulated patients.

The ODST has also been used to train nursing students in Canada [ Stacey 2009 ], as well as health care practitioners in North America, the UK, and Australia. It is free of charge.

## Financial disclosure

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# Tutorial

## 1. Decision Support and Shared Decision Making

Every day, people face complex health care decisions:

- Should I use condoms or the birth control pill?
- Are my symptoms severe enough to warrant stronger medications with more serious side effects?
- Should I have surgery to control uterine bleeding, back pain, prostate symptoms, obesity, or osteoarthritis?
- Should my relative receive care at home or in a facility?

Decision making is the process of choosing between alternatives, which may include doing nothing. It is an important phase of self-care or change [ Orem 1995, Prochaska 1997, Ruggiero 1997 ], and competent decision makers need to understand and consider:

- the courses of action open to them,
- the chances of positive and negative effects, and
- the relative desirability or value of these effects.

Although people want to pursue the option that is most likely to achieve desired outcomes and to avoid undesirable effects, **most health care decisions have no clear best choice**. Over 2500 health care interventions were classified as follows: 13% beneficial, 23% probably beneficial, 8% need to weigh benefits versus risks, 6% probably not beneficial, 46% insufficient evidence of usefulness. See Appendix C for other examples of complex decisions.

Most people want to be involved in making complex decisions, often in a shared role. **Shared decision making is defined as the process by which decisions are made by health care professionals and patients together**. It recognizes the expertise of each participant. Health care professionals are experts in diagnosing the problem and identifying options, benefits, harms, probabilities, and scientific uncertainties. Patients are the experts in understanding their personal circumstances and in judging the value or personal importance they attach to the benefits, risks, and scientific uncertainties of options.

A systematic review of the concept of shared decision making identified 161 definitions. The following list highlights the essential elements [ Makoul 2006 ]:

- Define/explain the problem
- Present options
- Discuss pros/cons (benefits, risks, costs)
- Clarify patient values/preferences
- Discuss patient ability/self-efficacy
- Discuss doctor knowledge/recommendations
- Check/clarify the patient's understanding
- Make or explicitly defer decision
- Arrange follow-up



Additional elements considered ideal include: provide unbiased information, define the patient's desired role for involvement, present evidence including probabilities, and reach mutual agreement.

However, for some people being involved in decisions is challenging, so they need help to become involved. Decision support is defined as the process by which individuals are helped in a non-directive way to facilitate progress in decision making.

Supporting patients allows them to share in health decisions. This support is a necessary component of client-centred care and informed consent. Client-centred care is defined as "providing care that is respectful of and responsive to individual patient preferences, needs and values and ensuring that patient values guide all clinical decisions" [ Institute of Medicine 2001 ].

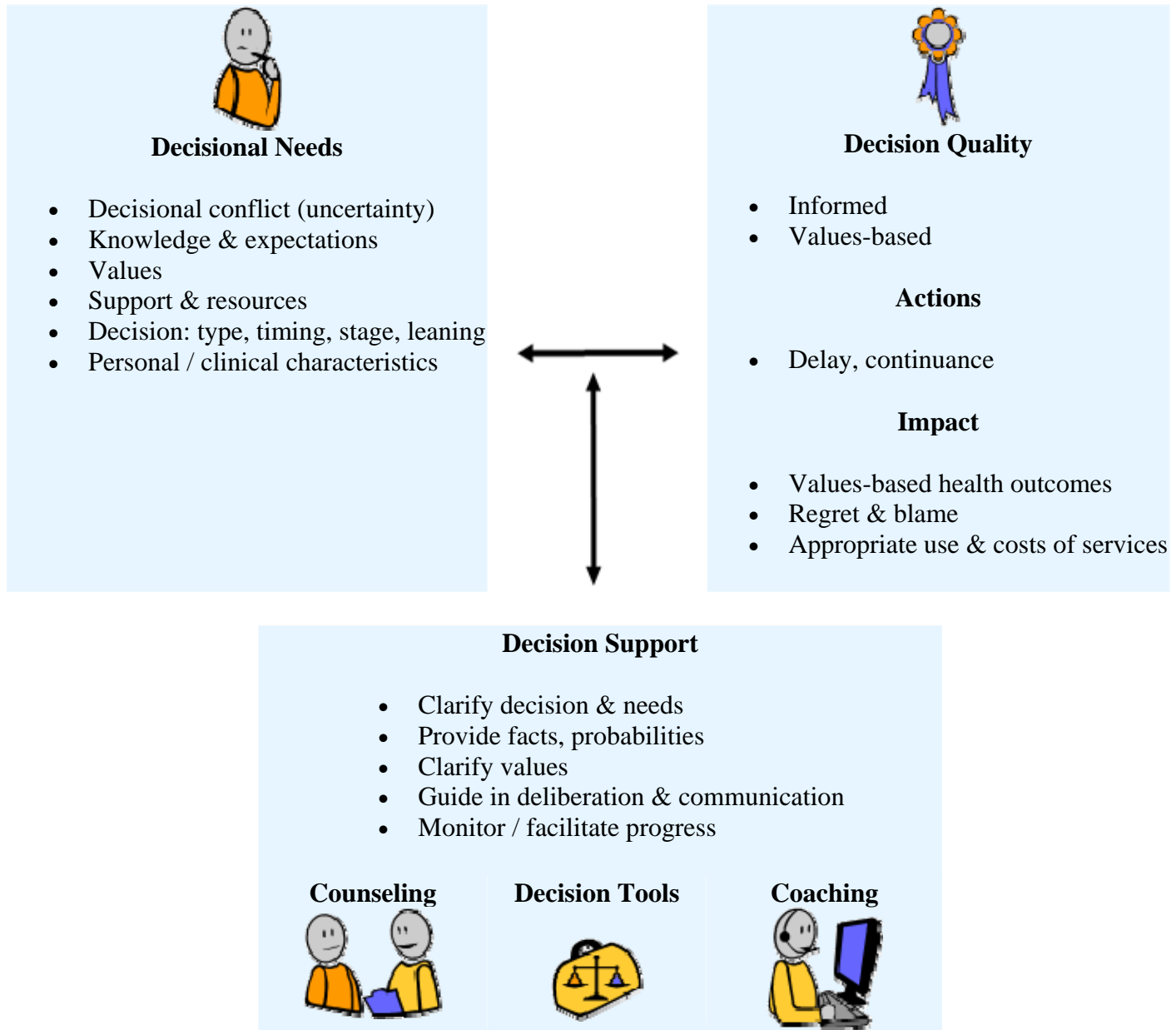
Informed consent, as described in legislation, generally implies that patients are informed of a particular treatment in light of alternative options. In May 2007, Washington State passed the first informed-consent legislation to indicate the need to acknowledge that shared decision making occurred as evidence to support informed consent to treatment. The description of shared decision making within this legislation includes patient engagement in decision making, use of patient decision aids, and the need to ensure patients' understand the seriousness of the disease and available treatment alternatives (including risks, benefits, and uncertainties) [ Keiser 2007 ].



## 2. Conceptual Framework

The Ottawa Decision Support Framework (Figure 1) is a conceptual model that uses concepts and theories from psychology, social psychology, economics, and social support [ Ajzen 1991, Bandura 1982, Fischhoff 1980, Janis 1977, Keeney 1982, Norbeck 1988, Orem 1995, Sjoberg 1983, Tversky 1981 ].

**Figure 1: Ottawa Decision Support Framework**



The framework applies to all participants involved in decision making, including the patient, couple, or family and their health practitioner(s). The framework has three key elements:

- a. decisional needs,
- b. decision quality, and
- c. decision support.



See Appendix D: Glossary of Terms for Ottawa Decision Support Framework.

The framework asserts that participants' unresolved decisional needs will have adverse effects on the quality of the decision, which in turn, adversely affects actions or behavior, health outcomes, emotions, and appropriate use and costs of services. However, decision support can improve the quality of a decision by addressing unresolved needs with clinical counselling, decision tools and coaching. Each of these is described in detail below.

**A. Unresolved decisional needs** that adversely affect decision quality include:

- decisional conflict (uncertainty);
- inadequate knowledge and unrealistic expectations;
- unclear values;
- inadequate support or resources;
- complex decision type;
- urgent timing;
- unreceptive stage of decision making; and
- participant characteristics such as
  - cognitive limitations,
  - poverty,
  - limited education, and
  - physical incapacitation.

**B. Decision Quality.** The aim of decision support is to help people make a "good" decision. However, what makes a good decision when the best choice depends on how the patient weighs the benefits versus the harms? Several surveys conclude that good decisions are ones that are:

- Informed with best available evidence (i.e. Does the patient understand the key facts about their condition, options, benefits, and harms? Are the patient's expectations of the probabilities of benefits and harms realistic?)
- Based on the patients' values (Is there a match between what an informed person values and what they choose?)

In addition to decision quality, evaluators are often interested in the impact of the decision on behaviour. (i.e. Did the patient delay or make a decision? Did the patient continue with their chosen option?) Evaluators may also be interested in the impact of the decision on health outcomes, emotions such as regret or blame, and use of health services and costs.

**C. Decision Support.** Support is tailored to the patient's decisional needs in terms of clinical counselling, patient decision aids and coaching. It includes:

- clarifying the decision and the patient's needs;
- providing facts and probabilities;
- clarifying values;
- guiding in deliberation and communication; and
- monitoring/facilitating progress in decision making.

Health professionals tend to over-use factual information about options and under-use other strategies. The elements of decision support are described in detail in the next sections.

References to the Ottawa Decision Support Framework [ Murray 2004, O'Connor 1998, O'Connor 2002, Stacey 2009 ].



### 3. Clarifying Decisional Needs

**Assessing decisional needs is essential to determining the type and intensity of decision support required for an individual situation.**

**3.1 Decision type, timing, stage and leaning.** Practitioners need to tailor decision support to the type of decision. For example, the approach may differ if the focus is on screening for prostate cancer, treatment of early stage disease, treatment of recurrence, or end-of-life care. Tailoring the support also depends on timing. Having to make big decisions on short timelines often increases stress, but very long time lines may increase decision delay.

In the very early and very late stages of decision making, it is important to gauge the patient's receptivity to new information and further deliberation. Otherwise, decision support may be irritating or unproductive. The aim of decision support is to help the patient progress in their stage of decision making, not necessarily "change". Sometimes "maintaining the status quo" is a reasonable option (e.g. forgoing PSA testing, amniocentesis, or hormone therapy).

Patient's stage of Decision Making	Patient's decisional conflict (uncertainty) is usually	Appropriate Decision Support strategy
Not thinking about options	High	Gauge receptiveness to new information ( the patient may still be in shock or denial). If the patient is receptive, provide information. If unreceptive, discuss issues that are immediately relevant to the patient.
Actively deliberating	High	Decision support is usually most helpful now.
Close to making a choice	Lower	Gauge receptiveness to discussing what led them to the choice they are close to making.
Taking steps, already implemented	Low and often will increase with additional decision support [ Grant 2001 ]	Gauge receptiveness to discussing what led the patient to the steps/choice they have taken. Sometimes, people will start implementing a process even though they are not fully committed to it (e.g. putting a family member's name on a waiting list for a nursing home that specializes in dementia, even though the decision about placement has not been finalized by the family). Others are implementing choices that they tend to reconsider over time (e.g. in cases of menopause, attention deficit disorder).

**3.2 Personal/Clinical Characteristics.** Decision support should be gender-sensitive and appropriate for an individual's age, developmental stage, education, socioeconomic status, and ethnicity. Adjustments should be made to accommodate a person's physical, emotional and cognitive capacities [ Fitten 1990, Scott 1983 ]. It is important to involve the family or a personal advocate when the patient's capacities are limited. The characteristics of the practitioner will also influence decision support provided based on the practitioner's training, experience, and counselling style.





**3.3 Decisional Conflict.** The North American Nursing Diagnosis Association includes decisional conflict in its taxonomy of problems:

***Decisional Conflict (specify)** is the uncertainty about which course of action to take when choice among competing actions involves risk, loss, regret or challenge to personal life values (specify the focus of conflict, such as personal health, family relationships, career, finances, or other life events) [ NANDA 2005 ].*

The primary characteristic of decisional conflict is verbalized uncertainty. However, any of the characteristics described below may be present [ NANDA 2005, O'Connor 1997 ]. Their frequency can vary among different individuals, types of decisions, and time frames. See Appendix A: Research on Manifestations of Decisional Conflict for details. They become more frequent as the patient starts to consider the options and then tend to diminish after the decision is made [ Janis 1977 ].

- **Verbalizes uncertainty about choice**  
(e.g., "I'm not sure what to do.")
- **Verbalizes concern about undesired outcomes**  
(e.g., "I keep thinking about the things that could go wrong if I have this surgery;" "I could have a complication;" "I may not recover.")
- **Wavers between choices**  
(e.g., "One day I think I will take the medication, the next day, I change my mind.")
- **Delays decision**  
(e.g., "I keep putting it off...I don't want to have to face this choice right now.")
- **Questions personal values** or what is desirable or important to them  
(e.g., "I don't know about amniocentesis...I have to think carefully about what I would do if I found out the baby was abnormal...what are my beliefs?")
- **Is preoccupied with decision**  
(e.g., "This decision is all I have been thinking about lately...my family is getting impatient with me because I keep dwelling on this decision and neglecting them.")
- **Shows signs and symptoms of distress or tension**  
(e.g., signs of increased muscle tension, onset of restlessness, increased heart rate. "I feel wound up... I can't sleep...my hands shake")

People will also have more decisional conflict if other decisional needs are not addressed. See Appendix B: Research on factors that contribute to decisional conflict. These needs are discussed below.

**3.4 Lack of knowledge** about options and the potential outcomes of options

(e.g., "I don't know what I can do to relieve these symptoms...I need to find out about the side effects.")

**3.5 Unrealistic expectations** or perceptions of the likelihood of outcomes, such as exaggerating or minimizing the chances of outcomes

(e.g., "That treatment gives everyone cancer;" "My mother had a beautiful natural childbirth when I was born and I will do the same;" "That treatment never works." Other terms people use when discussing expectations include: "how likely?", "what are my chances?", "what are the probabilities?", "how frequently/often does that happen?")

**3.6 Unclear values**, or the personal importance or desirability of outcomes

(e.g., "I haven't given much thought about the pros and cons of taking hormones during menopause;" "I feel miserable and need some relief, but I don't believe in taking pills for a natural phase of life and I worry about



the serious risks...it is hard to say whether the positives outweigh the negatives...;" Other words patients use when discussing values include: "good/bad", "important", "worried", "concerned about", "tolerate", "desire", "comfortable", "unacceptable", "bothersome", "outweigh", "tradeoffs", "worth it", "number one thing", "priority", "put up with", "happy with", "personal cost too great". )

### **3.7 Unclear perceptions of others**, including opinions and practices

(e.g., "I'm not sure what my [doctor/family] thinks of these options;" "What do other people do in this situation?")

### **3.8 Social pressure** to choose one option

(e.g., "My family has made it very clear they think I should breast feed.;" "I feel society disapproves of people choosing any other option but this one.")

### **3.9 Lack of support, or mismatch between preferred and actual role in decision making**

(e.g., "My doctor is hopeless in discussing options other than surgery... it's his way or the highway" "I have no one to talk to about this decision;" "My mother can't take care of herself...my sisters have told me they want nothing to do with figuring out where she should live...it's up to me...I would rather share the decision with my family.")

### **3.10 Lack of skills/self-confidence**

(e.g., "I've never had to make a decision like this before; I'm not sure I can do this.")

### **3.11 Lack of other resources**

(e.g., "We don't have any groups in our town that provide information or support for families affected by schizophrenia")

Fortunately, many of these factors that make the decision more difficult can be addressed by counselling, decision aids, and decision coaching interventions.



## 4. Providing Facts and Probabilities

**4.1 Knowledge deficits** are addressed by helping the patient to access information on their health situation, the options available, and the potential outcomes of the options. Potential benefits and harms should both be presented in sufficient detail to enable informed decision making. The information may be delivered by the practitioner, provided as written materials or delivered via multimedia presentations. The medium and pace with which the information is provided should be appropriate to the patient's needs. It is important to assess the patient's comprehension of the information after it has been provided; the focus should be on information that is "essential" for decision making.

**4.2 Unrealistic expectations** can be **re-aligned** in two ways. First, practitioners can provide information on the probabilities of the outcomes for each option, as observed in people with characteristics similar to the patient facing the decision [ Trevena 2006 ]. Second, practitioners can describe the outcomes to patients in ways that make these outcomes easier to imagine and identify with [ Tversky 1981 ]. In cases where the patient overestimates the chances of an outcome occurring, the practitioner should acknowledge the possibility, but then describe anecdotes (vivid stories) in which the outcome did not happen. In cases where the patient underestimates the chances of an outcome occurring, the practitioner should acknowledge the possibility, but then describe anecdotes in which the outcomes did happen.



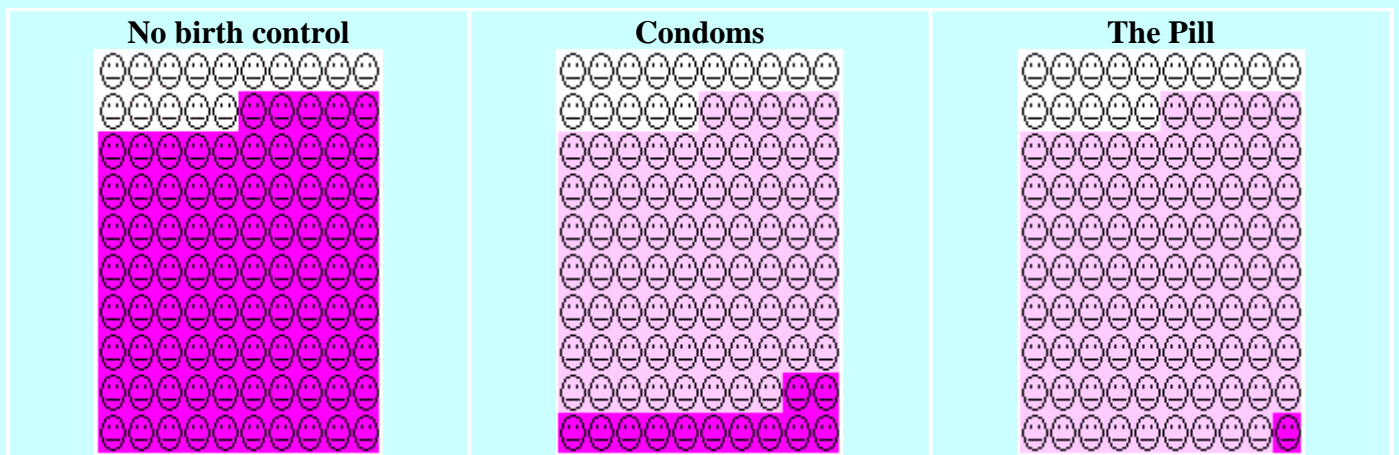
**Example of Re-aligning Expectations**

A 17-year-old Sara visits the Teen Clinic looking for birth control options. Her partner is willing to use a condom, although sometimes they forget. He has encouraged her to go to the clinic. She doesn't think that she has a great risk of getting pregnant, because she has been lucky so far.

Using Numbers. "Many believe that their chances of becoming pregnant are very low, so you are not alone in thinking this way. But the chances are very high with no protection over 1 year. If 100 women like you did not use any birth control method for a whole year, about 85 of them would get pregnant and 15 would not. If the same 100 women and their partners used condoms all of the time, about 12 of them would get pregnant and 88 of them would not. If 100 women were to take the pill for a year, 1 of them might get pregnant and 99 would not.

These blocks of 100 faces show our 'best estimate' of what happens to women who choose different options **for 1 year**. Each 'face' stands for one woman and there is no way of knowing in advance which woman stands for you. The women who are shaded **dark pink** get pregnant and the women with **'no shading'** do not get pregnant. The women shaded **'light pink'** prevented a pregnancy by using birth control. You can see that using birth control prevents many pregnancies, and the pill is better than condoms.

**Figure 2: Blocks of 100 faces**



Using Stories. A practitioner can provide countervailing stories if Sara still believes her risks for getting pregnant without birth control are very low, [e.g. Sara says "I know lots of my friends didn't use birth control and never got pregnant"]. The practitioner may ask Sara if she knows of friends and acquaintances who did become pregnant, and ask her what happened to them. The practitioner may add: "All I can do is share my experience with hundreds of young women we see at our clinic who were not using any regular method of birth control and get pregnant. If the risks of getting pregnant were as low as you think they are, we would be seeing far fewer cases of teenage pregnancy than we do."



## 5. Clarifying values

**Unclear values**, or uncertainty regarding the level of personal importance the patient attaches to the benefits and risks of the options, can be addressed using values clarification strategies. First, the patient cannot judge the value of outcomes based solely on an abstract understanding. [ Fischhoff 1980 ]. Therefore outcomes need to be described in familiar, simple and experiential terms. This description will help the patient judge whether or not they personally attach importance to each benefit or risk associated with a given outcome [ Fischhoff 1980 ]. Therefore outcomes need to be described in familiar, simple and experiential terms. This description will help the patient judge whether or not they personally attach importance to each benefit or risk associated with a given outcome

Next, the patient is asked to consider the level of importance they personally attach to the positive and negative outcomes. Sometimes, explicit values clarification exercises are implemented using: a) numerical rating scales (0 = not at all important to 10 = very important) or graphic exercises (adding 1 to 5 stars as shown in below), to facilitate the patient's communication of personal importance [ O'Connor 1999 ].

Finally, the patient needs a strategy for communicating their values when discussing the options with others. People, including clinicians and family members, are not very good at judging the values of others. It may be helpful to use rating scales or balance scales using stars (\*) to show what is important, which can be viewed "at a glance".

Case study: 51-year-old Maria is considering hormone therapy because more conservative approaches have not relieved the severe hot flashes that disturb her sleep, and ability to function at work and at home. Her practitioner has explained the annual risks and benefits for a woman taking estrogen and progestin but Maria remains unsure. Her practitioner asks her to rate the importance of relieving her symptoms using "0 to 5 stars". Five stars means it is very important to relieve her symptoms, 1 star means it is a little important, and 0 stars means it is not at all important.

As shown below, Maria says relief from symptoms is worth 5 stars (\*\*\*\*\*).

Then the practitioner asks her to rate the importance of her worry about the risks. Maria says she would rate the worry about complications to be 2 stars (\*\*).

When her practitioner asks Maria what that means to her, she realizes that the relief of her symptoms is more important to her than the worry about complications. She decides to give hormone therapy a try.

Benefits	How much does it matter to you?	Risks	How much does it matter to you?
Relief from severe hot flashes and sleep problems that affect function at work and home.	* * * * *	Worry about complications (If 1000 women in their 50's took HRT for 1 year, 999 are OK but 1 may develop a blood clot in the lung, leg, or brain).	* *



## 6. Guidance to Address Inadequate Support and Resources

**6.1 Unclear or biased perceptions of others' opinions.** First, it is important to present all available options, so that the patient is aware of the alternatives they can consider. Next, the practitioner can present examples of others' choices, in a balanced manner, so that the patient is aware that people choose different options and there is no "one size fits all" answer. Finally, the practitioner can provide statistics on variation in choice, for example the percentage of people who choose the different options that are available, the differences in practitioners' opinions, or the differences in practice guidelines. It is also helpful to present the rationales behind the differing opinions. Often, differences in choices reflect scientific uncertainty, differences in people's circumstances, tolerance for risk or uncertainty, or the patients' personal values.

**6.2 Social pressures** are addressed first by exploring the nature of the pressure (including its source), the areas of agreement and disagreement, and the reasons behind differences in points of view. Next, the patient is guided to: a) verify their perceptions of others' opinions (in case there are misconceptions) b) focus on only the opinions of those whose opinions matter most (i.e. ignore peer pressure to choose an option), and c) handling relevant sources of pressure (e.g. family members who have a legitimate stake in a decision about placement of an elderly relative). Strategies for dealing with people who are exerting pressure include:

- planning how to communicate information and values;
- inviting others to discuss their perceptions of options, benefits, harms, and values to find areas of agreement and disagreement;
- mobilizing social support; and
- identifying a mediator, if needed.

Rehearsing strategies through role-playing can also be helpful.

**6.3 Lack of support or resources.** The practitioner should help the patient to access support or resources needed to make the decision. In some cases, the practitioner's support is all that is needed to make the decision. Additional resources that patients could require may include health professionals that are personal advocates, family and friends, support groups, or services from voluntary or government sectors.

**6.4 Lack of skills or confidence in decision making** may be improved by providing structured guidance in the steps of decision making (deliberating about a decision), and how to communicate their preferences

[ Butow 1994, Davison 1997, Frederikson 1995, Greenfield 1985, Greenfield 1988, McCann 1996, Robinson 1985, Roter 1977 ].

**6.5 Preferred role in decision making.** The type of guidance the practitioner must give will depend on the role the patient prefers to take in decision making According to Rothert and Talarczyk [ Rothert 1987 ], the clinicians' expertise lies in providing information about the options available, their outcomes, the associated risk/probability, and the health care resources required and available. The patients' expertise includes their preferences or values and personal, social, and available economic resources. Degner et al. [ Degner 1988, Degner 1997 ] found that people can be classified into three profiles of preference for decisional control: those who want to keep, share, or give away control for decision making. "Keepers" might guide the deliberation and ask their practitioner for input on the scientific facts. Practitioners might start by providing guidance to "sharers", who would then become actively involved in the decision. A more advisory role might be used by practitioners with "givers away" who would then be asked to provide informed consent. It is important, however, for practitioners not to take the patient's preferred role in decision making as a constant; providing people with decision support often increases their desire for active participation in decision making [ O'Connor 2009 ]. Therefore, people need adequate information about the issues and time to consider which decision making role they prefer to take.



## 7. Monitoring and Facilitating Progress

Once the patient's needs have been addressed, it is important to monitor patient progress in resolving needs, moving through the stages of decision making, and achieving the best possible decision. It is a challenge to define a "good" decision when the best choice depends on how the patient values benefits versus harms. The International Patient Decision Aids Standards (IPDAS) Collaboration ([ipdas.ohri.ca](http://ipdas.ohri.ca)) has reached a consensus that a good decision is one that is "informed" and "values-based" [ Elwyn 2006, Elwyn 2009 ].

The quality of a decision can be evaluated informally by asking patients directed questions to determine how well they understand the key facts relevant to their options (including benefits and harms), how realistic their perception of the chances of benefits and harms are, and how well their preferred option matches their informed values. Perception of decision quality can be assessed using the SURE Tool [ Légaré 2010 ] or instruments designed to test knowledge of the key facts and strength of values associated with specific decisions. The quality of decision support provided can be assessed using the Decision Support Analysis Tool (DSAT-10) [ Stacey 2008c ]. This tool can be used for self-appraisal, or by a third party not involved in the decision making process. They also help a patient to consider, and become committed to, taking the next steps.

The following sections describe the patient decision aids.



## 8. Using General Decision Support Tools

General guides and tools have been developed to assess needs and plan decision support [ Janis 1977, Pender 1987 ]. The Ottawa Personal Decision Guide and the Ottawa Family Decision Guide are framework-based tools to help people and their practitioners to structure, record and communicate their needs and plans. The guides may be useful when a practitioner anticipates that the patient may have difficulty making a decision, or when the patient expresses difficulty making a decision. The guide can be self-administered or practitioner-administered. It has been used to guide decision coaching.

Decision coaching is defined as decision support provided to people facing a decision by a trained facilitator [ O'Connor 2008, Stacey 2008b ]. This facilitator is supportive but non-directive in the decision. Coaching can be provided face to face (individual, group) or using communication technologies (telephone, Internet). Decision coaching is used alone or in combination with patient decision aids. Strategies may include:

- clarifying decision and monitoring needs
- facilitating access to evidence-based information
- verifying understanding
- clarifying values
- building skills in deliberation, communication, and accessing support
- monitoring and facilitating progress in decision making and decision quality [ Stacey 2008c ]

Decision support tools include:

- 1-page Ottawa Personal Decision Guide (interactive PDF)
- 2-page Ottawa Personal Decision Guide (PDF to be printed and filled out)
- 2-page Ottawa Family Decision Guide (interactive PDF)
- Versions of these guides are also available in French and other languages here

**8.1 Clarify the decision:** The first steps focus on clarifying what specific decision has to be made, when the decision has to be made (timing), the stage of the patient's decision making, and their leaning.

**8.2 Explore the decision:** Subsequent questions probe a person's knowledge, values, and support.

**8.2.1 Knowledge, expectations and values** are probed by completing the balance scale located in the middle of the form. First, the patient lists the main benefits and risks to ascertain knowledge of options and outcomes. Then, the patient is asked to underline the benefits and risks that are most likely to happen to ascertain expectations. This is followed by assigning stars (1-5) to indicate how much each benefit and risk matters to the patient (values). In some cases, it will be clear that the patient is unable to respond to the questions. It is not necessary to complete the balance scale in one sitting; the purpose is to determine gaps as a basis for planning next steps.

**8.2.2 Support** is probed by determining what role in decision making the patient prefers. More information about others involved (people, opinions, pressures, ways they can support) can be probed if there appear to be support problems from earlier questions. The focus should be on those who are most involved and important in the decision.

**8.3 Identify decision making needs:** One question elicits certainty about the course of action. The other questions focus on factors contributing to uncertainty such as **knowledge, values, and support**. These





questions are from the SURE Test [ Légaré 2010 ] ; a clinical practice version of the Decisional Conflict Scale [ O'Connor 1995 ]. The responses are organized to be able to identify problems "at a glance": if the patient responds "yes" to the items, there is no decisional difficulty. If the response is "no", there is decisional difficulty. The SURE Test and the full Decisional Conflict Scale are reliable and valid instruments [ Bunn 1996, Drake 1999, Fiset 2000, Légaré 2010, O'Connor 1995, O'Connor 1998 ] and show that greater decisional conflict occurs in those who: delay decisions, score lower on knowledge tests; are in the early phases of decision making, and/or have not yet received decision support. High decisional conflict after decision support predicts downstream effects:

- delay or discontinuance of chosen option,
- regret, and
- the tendency to blame their practitioner for bad outcomes [ Gattellari 2005, O'Connor 2005, Sun 2004 ].

The scale elicits people's overall comfort level regarding their knowledge, values, and support; however, probing is still required to find out specifically what the patient knows and values and the role they prefer to play in the decision making process.

**8.4 Next Steps:** Lists of general strategies to address the patient's unresolved needs pertaining to knowledge, values clarity and support are provided at the bottom of the OPDG, so that the decision support can be planned to address those decisional needs. As the decisional needs resolve or change, questions can be repeated and updated.



## 9. Using Patient Decision Aids

Generic decision guides can be supplemented with condition-specific patient decision aids. Patient decision aids or "shared decision-making programs" are interventions designed to prepare people for decision making; they do not replace counselling [ O'Connor 2009 ]. They help people to:

1. understand the probable benefits and risks of options;
2. consider the value they place on the benefits versus the risks; and
3. participate actively with their practitioners in deciding about options.

According to the International Patient Decision Aids Standards (IPDAS) Collaboration [ Elwyn 2006, Elwyn 2009 ] patient decision aids provide:

- information on the disease/condition, options, benefits, harms, scientific uncertainties;
- probabilities of outcomes tailored to the patients's health risk factors;
- values clarification such as describing outcomes in functional terms, asking patients to consider which benefits and risks matter most to them; and
- guidance in the steps of decision making and communicating with others.

Patient decision aids may be administered using various media before, during or after counselling. Most developers are moving toward web-based materials that can be printed or used online.

Excluded from the definition of patient decision aids are passive informed consent materials, educational interventions that are not geared to a specific decision, or interventions designed to promote compliance with a recommended option rather than a choice based on personal values.

Patient decision aids have been developed for a variety of screening, diagnostic, medical, therapeutic, and end-of-life decisions [ O'Connor 2009 ]. A list of currently available patient decision aids is found in the "A-Z Inventory of Patient Decision Aids" at the Patient Decision Aids website (<http://c-ohri-dev.ohri.ca/AZinvent.php>).

Several randomized controlled trials of patient decision aids show they are better than standard care in terms of:

- increasing participation in decision making without increasing anxiety
- improving decision quality
  - improved knowledge of options, benefits, harms
  - more realistic expectations of the probabilities of benefits and harms
  - better match between personal values and choice
- lowering decisional conflict
- helping undecided people to decide

Patient decision aids may also have a role in addressing under-use and over-use of options. They reduce the uptake of expensive surgical options that informed people don't value when baseline rates of these procedures are high. They also increase the uptake of colon cancer screening options, which are under-used, and lower the rates of prostate cancer screening tests, which are over-used.

See Appendix E: Research on patient decision aids



## 10. Case Study: Decision Support Using a Patient Decision Aid

Mrs. Maria G, a 67 year-old woman living with her 68 year old husband. They are both retired, having sold their corner grocery store to their only child, a 40 year old son who manages it with his wife. Mrs. G is in good health with the exception of osteoarthritis of the right knee, which has bothered her for the past 10 years. Her pain was controlled somewhat with acetaminophen, but being an active walker, she switched to over-the-counter NSAIDS, which provided better pain relief. Following a small GI bleed, her primary care doctor prescribed a Coxib (Celebrex), which controlled her pain very well without adverse effects. When the evidence on cardiovascular risk of Coxibs was published, she decided to switch back to Tylenol. However, her knee pain was not as well controlled, which affected her ability to go for walks with her grandchildren. Today, she visited her primary care doctor to discuss the benefits and risks of trying the Coxib again. Her doctor informed her that the decision hinged on her quality of life. If she thought her current symptoms were sufficiently intolerable to warrant the extra risk of heart attack, then taking a Coxib was reasonable. If she thought the risk was too great, then she should stick with her current regime. Her doctor referred Mrs. G to a nurse to provide further information on the options.

*[Nurse AC and Mrs. G exchange greetings. AC asks her to explain what brings her here.]*

**Mrs. G:** I want to learn more about the risk of heart attack from taking Celebrex. I took it before and it worked much better than Tylenol, but I got scared off by the risk of heart attack ... Dr R said you had information ... I would like to know my chances if I were to start again ... maybe it would be worth it to have less pain so I can get active again ... and walk with my grandchildren ... but, I am not going to take a big risk on my health ... we went through one heart attack with my husband and I want to avoid that if I can help it ...

**AC:** So you are not sure whether to stay with Tylenol or switch to Celebrex ... you need more information about the risks ... so you can judge whether the pain relief is more important to you than the risks ... is that what you are saying?.

**Mrs. G:** Yes, that's right.

**AC:** Is there anything else making this difficult to decide?

**Mrs. G:** I can't think of anything ...

**AC:** Who else is involved in making this decision?

**Mrs. G:** Well, there is my doctor ... my husband is interested in knowing more ... naturally he is concerned about risks ... although he thinks the choice is up to me and the doctor ... and so do I ...

**AC:** We have a decision aid you can work through *[Available here as Mrs. G. completed it]*. It is tailored to women in your age group. As well as giving information about benefits and risks ... including the numbers ... it helps you consider what is most important to you and what else you need to prepare you for decision making.

**Mrs. G:** I will give it a try ...

**AC:** Is there anything else you would like to discuss right now?

**Mrs. G:** No, I don't think so ... Would it be possible to stop by when I see my doctor next week?

**AC:** Yes, I can arrange to see you before your appointment ... bring your completed decision aid with you

... *[discusses time details]*

*[Mrs. G and AC exchange goodbyes.]*



## Follow-up Contact with the Nurse

*[She forgot to bring in her completed decision aid]*

*[Mrs. G. and AC exchange greetings.]*

**AC:** How far along are you with this decision?

**Mrs. G:** I am pretty sure I know what I want ... the Celebrex.

**AC:** Would it be helpful if we go over the things you considered before deciding?

**Mrs. G:** Yes, that would be fine.

**AC:** So would you say you know the options that are available to you?

**Mrs. G:** Yes, the information had the options my doctor mentioned, continue with Tylenol or switch to a Coxib ... the Celebrex ... it also had traditional NSAIDs, but my doctor did not advise this because I had bleeding from it before ...

**AC:** Do you feel you know both the benefits and risks of Tylenol and Celebrex

**Mrs. G:** Yes

**AC:** What do you see as the main differences between Tylenol and Celebrex?

**Mrs. G:** Well, not as many people get pain relief from Tylenol ... it's true in my case ... but Celebrex has a greater chance of heart attack ... the chance of bleeding is also higher ...

**AC:** Your big concern before was the chance of heart attack, what did you think of that?

**Mrs. G:** Well, I was surprised it was so low ... I thought it would be much bigger, but no ... it was 7 out of 1000 with Tylenol and 13 out of 1000 with Celebrex ... so the difference is small ... to me, there is a good chance it won't happen to me ...

**AC:** You realize that the risk is for one year? ...

**Mrs. G:** Yes ... one year ...

**AC:** So if you and your doctor decided on Celebrex, you would need to consider that risk each year when your prescription is renewed?

**Mrs. G:** Yes ... that makes sense ...

**AC:** You seem to be very informed. Would you say your questions have been answered?

**Mrs. G:** Yes, the information was helpful ...

**AC:** And you are clear about which benefits and risks matter most to you? ... whether the pain relief of Celebrex is worth the extra risk of a heart attack

**Mrs. G:** To me, the most important thing is pain relief ... it is more important than the risks ... the small risk of heart attack ...

**AC:** ... and the small chance you could bleed again?

**Mrs. G:** Yes

**AC:** So would you say you have enough support and advice to make a choice?

**Mrs. G:** Yes, my husband is happy with my decision ... I would like to run this by Dr R of course ...

**AC:** Would you say you are choosing without any pressure from others?

**Mrs. G:** Everyone has told me it is up to me ... I don't feel anyone is trying to get me to choose one way or another ...

**AC:** So you are saying you feel sure about the best choice for you?

**Mrs. G:** Yes, as long as Dr R agrees.

**AC:** You seem comfortable with your decision ... Is there anything else I can do for you?

**Mrs. G:** No, I appreciate your help ... thanks very much ...



### Follow-up Contact with the Nurse

*[Mrs. G remembered to bring her completed decision aid. The completed decision aid is available here and a one page summary is available here.]*

**AC:** How far along are you with this decision?

**Mrs. G:** I am pretty sure I know what I want ... the Celebrex.

**AC:** Would it be helpful if we review your responses to the decision aid together? ... I have them summarized on this form ... you can take a copy to show Dr R ...

**Mrs. G:** Yes, that would be fine.

*[AC and Mrs. G look at her copy of the form together.]*

### CERTAINTY

**AC:** As you mentioned, you feel Celebrex is the best choice for you?

**Mrs. G:** Yes.

### KNOWLEDGE

**AC:** Looking at your answers to the questions here ... you know the differences between the options ... that Coxibs like Celebrex have a greater chance of pain relief; but Tylenol has the smallest risks such as heart attack or bleeding; People who take Celebrex have 6/1000/yr more MIs than Tylenol ... You mentioned last week that your big concern was the chance of heart attack, what did you think of the numbers you saw?

**Mrs. G:** Well, I was surprised it was so low ... I thought the difference would be much greater, but no ... to me there is a good chance it won't happen to me ...

**AC:** You realize that the risk is for one year? ...

**Mrs. G:** Yes ... one year ...

**AC:** So if you and your doctor decided on Celebrex, you would need to consider that risk each year when your prescription is renewed?

**Mrs. G:** Yes ... that makes sense ...

**AC:** What other questions did you have?

**Mrs. G:** I can't think of any ... the information was clear ...

### VALUES

**AC:** You say here that you are clear about which benefits and risks matter most to you? ... pain relief was "5 out of 5" in importance, and the extra risks of Coxibs was "2 out of 5".

**Mrs. G:** Yes, pain relief is more important ...

### SUPPORT

**AC:** You seem to have good support from decision making ... you seem comfortable with the decision ...

### NEXT STEPS

**AC:** What do you see as the next steps? ...

**Mrs. G:** I plan to discuss this with my doctor ...

**AC:** Sounds good ... is there anything else you need from me? ...

**Mrs. G:** No ... I think I am set ...



## Appendices

### Appendix A. Research on manifestations of decisional conflict

**Population Studies.** One Canadian national telephone survey elicited the frequency of behavioural manifestations of decisional conflict when people faced a 'complex' decision affecting their health [ O'Connor 2003 ]. A complex decision was characterized as one in which the best choice depended on how people weighed the personal importance of the benefits versus risks. Among the respondents, (n=635), 65% reported making 'complex' health decisions, commonly about medical or surgical treatments or birth control, and more commonly by women and by married/separated individuals. When asked about difficulties in decision making:

- 59% reported they were unsure about what to choose, the hallmark of decisional conflict;
- 77% questioned what was important to them when making the decision;
- 61% worried about what could go wrong;
- 26% wavered between the available options;
- 27% wanted to delay the decision.

Two of these behaviours were associated with the type of decision. Higher rates of physical stress were reported by those who had made decisions about institutionalisation (54%) or medical treatment (46%), compared to those pondering birth control decisions (23%). Decision delay was more common among those deciding about institutionalisation (50%), compared to those making surgical decisions (20%).

**Clinical Studies.** Several small pilot studies have found a considerable portion of their respondents expressed uncertainty about what to choose, the main manifestation of decisional conflict (see below)

Study	N	% Uncertain
Osteoporosis Rx: women considering changing Rx [ Cranney 2002 ]	20	69%
Amniocentesis: pregnant women over 35 years [ Drake 1999 ]	21	67%
Tamoxifen chemoprophylaxis: women high risk for breast cancer [ Stacey 2003 ]	17	63%
Menopausal hormones: women considering current choice (about half are currently using) [ O'Connor 1998 ]	94	52%
Location of care for relative with dementia: proxy decision by caregivers [ Comeau 2001 ]	27	48%
Stage IV lung cancer Rx: men/women after consultation with oncologist [ Fiset 2000 ]	12	47%
Location of death: terminally ill women at various stages of decision making [ Murray 2004 ]	20	43%
Circumcision male newborns: prospective parents attending prenatal classes [ Taylor-Clapp 2001 ]	88	33%
Pre-donating blood before cardiac surgery: men/women after consultation with surgeon [ Grant 2001 ]	59	15%

These studies are limited to Canada and the clinical samples were small. More research is needed on the prevalence of decisional conflict and related factors for the many decisions people face (See Appendix C). Our group is working with investigators in other countries to learn more about the prevalence of the problem and contributing factors.



## Appendix B. Research on factors contributing to decisional conflict

**Population Studies.** The aforementioned Canadian national telephone survey [ O'Connor 2003 ] examined the reported factors contributing to decisional conflict. The overall prevalence of problems was low, with 9 to 27% reporting problems such as unclear values, pressure from others, or deficits in motivation, skill, support, or knowledge. However, these problems were much greater in those who had experienced uncertainty when choosing (the main hallmark of decisional conflict) than those who had not. For example, about a third of the uncertain group reported information deficits regarding the options, pros, and cons and their likelihood, compared with 16% of the certain group. At least a quarter reported social deficits such as not knowing what others decide or recommend, pressure, and lack of support. About 17 to 19% reported deficits in skills and readiness for decision making. The most frequently cited other factor contributing to the difficulty of the decision was the highly charged emotional environment in which the decision was made. When we examined the association between decision type and each of the reported factors, more respondents making decisions about birth control felt they had the ability or skill to make the decision (95%) compared to those making decisions about surgery (80%).

**Clinical Studies.** Several small pilot studies have found a considerable portion of their respondents expressed factors contributing to decisional conflict (see below).

Study	N	Uninformed	Unclear values	Unsupported
Osteoporosis Rx [ Cranney 2002 ]	20	59%	31%	39%
Amniocentesis: pregnant women over 35 years [ Drake 1999 ]	21	76%	54%	61%
Tamoxifen chemoprophylaxis: high risk women [ Stacey 2003 ]	17	73%	63%	53%
Menopausal hormones [ O'Connor 1998 ]	94	43%	42%	52%
Dementia: location of care proxy decision by caregivers [ Comeau 2001 ]	27	30%	37%	45%
Stage IV lung cancer Rx after consultation with oncologist [ Fiset 2000 ]	12	25%	28%	13%
Location of death, terminally ill women [ Murray 2004 ]	20	38%	20%	17%
Prospective parents: circumcision male newborns [ Taylor-Clapp 2001 ]	88	45%	51%	35%
Pre-donating blood before cardiac surgery [ Grant 2001 ]	59	13%	15%	14%

It is evident that the most common factor contributing to decisional conflict varies by the type of decision. These studies need to be enlarged with more representative populations before drawing firm conclusions.



## Appendix C. Examples of potentially difficult decisions which may create decisional conflict

Difficult decisions in a population-based survey (n = 635)

Treatment Decisions		
<b>Surgery (30 %)</b>		<b>Medications (27%)</b>
<ul style="list-style-type: none"> <li>• Hysterectomy</li> <li>• Tumour removal</li> <li>• Laminectomy</li> <li>• Benign prostatic hyperplasia</li> <li>• Prostate cancer</li> </ul>		<ul style="list-style-type: none"> <li>• Hormone replacement therapy</li> <li>• Atrial fibrillation</li> <li>• Chemotherapy</li> <li>• Lipid lowering medication</li> <li>• Antidepressants</li> </ul>
Reproductive Decisions		
<b>Contraception (24%)</b>		<b>Pregnancy (5%)</b>
<ul style="list-style-type: none"> <li>• Method</li> <li>• Sterilization</li> <li>• Abortion</li> <li>• Adoption</li> </ul>		<ul style="list-style-type: none"> <li>• Childbirth (delivery)</li> <li>• Fatherhood / motherhood</li> <li>• Breastfeeding</li> </ul>
Lifestyle Decisions	Investigation Decisions	End of Life Decisions
<b>Lifestyle (5%)</b>	<b>Diagnostic tests (1%)</b>	<b>Institutional placement (6%)</b>
<ul style="list-style-type: none"> <li>• Nutrition</li> <li>• Weight loss</li> <li>• Stress</li> <li>• Smoking</li> <li>• Drug or alcohol use</li> </ul>	<ul style="list-style-type: none"> <li>• Amniocentesis</li> <li>• Radiography</li> <li>• Ultrasound</li> </ul>	<b>Discontinuation of life support (0.5%)</b>

[ O'Connor 2003 ]

### The A to Z Inventory of Patient Decision Aids

The Ottawa Patient Decision Aids Web site hosts a searchable database of available patient decision aids:  
<http://c-ohri-dev.ohri.ca/AZinvent.php>.





## Appendix D. Glossary of terms for Ottawa Decision Support Framework

### DECISIONAL NEEDS

#### DECISION

**Type:** class or characteristic of the choice that needs to be made (e.g. developmental transition or clinical options (screen, test, treat, palliate)), number of options, degree of risk/uncertainty, seriousness of outcomes, margin for error (i.e. whether it is irrevocable).

**Timing:** time frame or urgency with which a decision needs to be made.

**Stage:** phase of decision making:

- not thinking about options;
- considering options;
- close to selecting an option;
- taking steps towards implementing option;
- have already carried out choice.

Categories are similar to Prochaska's Stages of Change [ Prochaska 1997 ], with one important difference. Deciding not to change is a viable option because often there is no recommended course of action, (e.g. amniocentesis).

**Leaning:** inclination to choose one option over the other.

#### DECISIONAL CONFLICT

Uncertainty about which course of action to take when choice among options involves risk, loss, regret, challenge to personal life values.

#### KNOWLEDGE & EXPECTATIONS

**Knowledge:** cognizance of the health problem or situation, options, and outcomes.

**Expectation:** perceived likelihood or probability of outcomes of each option.

#### VALUES

Desirability of, or personal importance attached to, outcomes of options.

#### SUPPORT & RESOURCES

**Others' opinions / practices:** perceptions of what others decide or what others think is the appropriate choice. This may include the patient's spouse, family, peers, and practitioner(s). For practitioners: the patient, professional peers, and personal network.

**Pressure:** perception of persuasion, influence, coercion from important other(s) to select one option.

**Role in decision making:** the way a participant is or wants to be involved in decision making. Do they prefer to:

- Make the choice themselves after considering opinions?
- Share decision making with another?
- Have others decide after considering their opinion?

**Experience:** past exposure to the situation, options, outcomes, decision making process.

**Self-efficacy:** confidence or belief in one's abilities in decision making, including shared decision making.

**Motivation:** readiness and interest in decision making, including shared decision making.

**Skill:** abilities in making and implementing a decision.

**External support:** Available, accessible assets from others that are required to make and implement the decision. Types include: information, advice, emotional support, instrumental help, financial assistance, health & social services. Sources include: social networks, professional networks, support groups, voluntary agencies, and the formal health care, education, and social sectors.



## **PERSONAL & CLINICAL CHARACTERISTICS**

**Patient:** age, gender, education, marital status, ethnicity, occupation, locale, diagnosis & duration of condition, health status (physical, emotional, cognitive, social).

**Practitioner:** age, gender, ethnicity, clinical education, specialty, practice locale, experience, counselling style.

## **DECISION SUPPORT**

### **PATIENT DECISION AIDS**

Evidence-based tools to prepare people to participate in making specific and deliberated choices among healthcare options in ways they prefer. They supplement (not replace) clinician's counselling and aid decision making by:

- a. providing evidence-based information about a health condition, the options, associated benefits, harms, probabilities, and scientific uncertainties;
- b. helping people to recognize the values-sensitive nature of the decision and to clarify the value they place on the benefits, harms, and scientific uncertainties. Strategies include: describing the options in enough detail that patients can imagine what it is like to experience the physical, emotional, and social effects; and guiding patients to consider which benefits and harms are most important to them; and
- c. providing structured guidance in the steps of decision making and communication of their informed values with others involved in the decision (e.g. clinician, family, friends).

### **DECISION COACHING**

Support provided to people facing a decision by a trained facilitator who is supportive but non-directive in the decision. Coaching can be provided face to face (individual, group) or using communication technologies (telephone, Internet). Decision coaching is used alone or in combination with patient decision aids. The strategies may include:

1. clarifying decision and monitoring needs;
2. facilitating access to evidence-based information by:
  - o verifying understanding;
  - o clarifying values;
  - o building skills in:
    - deliberation,
    - communication, and
    - accessing support; and
3. monitoring and facilitating progress in decision making and decision quality.

## **DECISION QUALITY**

### **QUALITY OF THE DECISION**

The extent to which the chosen option best matches informed patients' values for benefits, harms, and scientific uncertainties.

### **QUALITY OF THE PROSESS OF DECISION MAKING**

The extent to which the patient is helped to:

- a. recognize that a decision needs to be made;
- b. know about the available options and associated procedures, benefits, harms, probabilities, and



- scientific uncertainties;
- c. understand that values affect the decision;
- d. be clear about which features of the options matter most to them (e.g. benefits, harms, and scientific uncertainties);
- e. discuss values with their clinician(s); and
- f. become involved in decision making in the ways they prefer.



## Appendix E. Research on patient decision aids

There is an ongoing systematic review conducted by an international team of investigators through the Cochrane Collaboration [ O'Connor 2009 ]. In their 2010 update, they found over 200 patient decision aids, of which over 130 are available for use. The full Cochrane Systematic Review of Patient Decision Aids is available on the Ottawa Patient Decision Aids Web site (<http://c-ohri-dev.ohri.ca/cochsystem.html>). Also available on the Web site is the Complete Inventory, a list of patient decision aids that are in development or completed (<http://c-ohri-dev.ohri.ca/cochinvent.php>).

The systematic review found 86 randomized trials of patient decision aids. When these trials were analysed, the following conclusions were made. Patient decision aids improve decision quality by:

- increasing knowledge of the options,
- creating realistic expectations of the benefits and harms of options, and
- improving the agreement between personal values and the options chosen.

Patient decision aids improve decision making by:

- reducing decisional conflict scores, particularly in the area of feeling informed;
- reducing the number of people who are uncertain about what to do; and
- increasing people's participation in decision making without increasing anxiety.

The impact of patient decision aids on satisfaction with decision making is more variable. Moreover, patient decision aids have not affected health outcomes; however, measures of outcomes were not linked to patients' values (e.g. did patients achieve outcomes they preferred most and avoid outcomes they preferred least). The trials in progress should shed more light on the influence of patient decision aids on: diverse groups of practitioners and patients; patient-practitioner communication; and downstream effects such as persistence with chosen therapies, distress, regret, and the extent to which patients achieve outcomes they prefer and avoid outcomes they do not prefer.



## Appendix F. Optional extra material on communication skills

Adapted from Bunn H, O'Connor A, Jacobsen, MJ. Analyzing Decision Support and Related Communication ©1998, 2003.

Effective communication skills are essential for good decision support. Ivey & Bradford-Ivey caution against overemphasizing communication skills, which can result in talk rather than action, and technique rather than substance [ Ivey 2003 ]. The key to effective decision counselling is to move beyond the mere mechanistic application of a range of communication skills to focus on being with the patient in a true encounter [ Arnold 1995, Egan 1990, Hartrick 1997, Sundeen 1994 ]. However, there needs to be a balance between the skill and art of communication. The practitioner who is confident and competent in using communication skills may be freed up to focus on relating to the patient that they are counselling.

There may be a tendency in decision making interviews to be more mechanistic, rely more heavily on questioning skills and focus on the cognitive elements of the decision. However, it is important to remember that when people are trying to make decisions, all aspects of the person - cognitive, affective, social and spiritual - are involved.

Key communications techniques [ Arnold 1995, Ivey 2003 ] include:

- listening skills (e.g. encouraging, paraphrasing, reflecting feeling, summarizing, validating);
- questioning skills (e.g. open and closed questions); and
- sending messages, (e.g. providing feedback and providing information).

### Listening Skills

Listening skills include encouraging talk, paraphrasing content, reflecting feelings, summarizing key comments and validating accuracy of perceptions.

**Encourage talk.** "Encouragers" are prompts to encourage the patient to continue.

Prompts the patient to continue talking using encouragers or key words

May be cues ("**uh huh**"), leads ("**go on**"; "**and then?**") or repeating the patient's key words or phrases ("**It's upsetting.**")

**Paraphrasing content.** The goal is to promote personal exploration, clarify the content or cognitive component of a patient's message and communicate that the patient's unique perspective has been heard and understood [ Egan 1990 ]. To paraphrase properly, the practitioner must communicate back to the patient (in his/her own words) the essence of what has been said. It is often helpful to include a few key words, which a patient has used, but avoid "parroting" or repeating the exact response, which can be irritating and disrupt communication.

Shortens and clarifies the essence of what the patient has just said (content) and feeds back in practitioner's own words

Monica: "I spent a long time trying to sort out the information package the nurse gave me on hormones."  
Practitioner accurately feeds back Monica's content. ("**So, you found it difficult to understand the material.**")



**Reflection of feelings.** People are usually reluctant to disclose personal feelings until trust has been established. Practitioners should avoid eliciting in-depth reflection of feeling early in the relationship, as the patient is likely to be resistant or frightened by the experience [ Egan 1990 ]. It is wise to use brief reflections, at an interchangeable level, (reflect back feelings at the level of awareness and intensity communicated by the patient without taking away from the meaning of the message). Such reflection communicates that the practitioner understands the feelings being experienced by the patient and often serves to free-up the patient for further problem solving.

Identifies what the patient is feeling now and feeds back in practitioner's own words

Monica: "I've looked at the material but I seem to go back and forth and still don't know what to do."

Practitioner accurately feeds back Monica's current feelings.

**("So, you're unsure about which option is best for you.")**

**Summarization of the patient's key comments** can be used effectively mid-way through an interaction and in the final stage of the interview [ Egan 1990 ]. The practitioner notes the patient's verbal behaviour over a period of time and communicates his/her understanding of key concepts back to the patient. Effective summarization, by tying together critical elements of the situation, assists people to gain a broader perspective of the situation rather than becoming mired in detail.

Condenses several key comments made by the patient over time during the interview (content and/or feelings) and feeds back in practitioner's own words

Practitioner focuses on Monica's key content and/or feelings

**("So, you've read the information, you've discussed the issue with your partner but you're having difficulty making a decision because you're worried about the risks.")**

**Perception checks** are used to verify with the patient that the practitioner is interpreting the patient's message clearly. Perception checks are often used following a paraphrase or a summary.

Checks to ensure that what is said or heard is accurate; may be used after a paraphrase, reflection or summary

Monica: "It's difficult to decide. My symptoms are really not that bad. I don't know."

Practitioner validates accuracy of understanding with Monica. ("You're saying that you're not ready to make a decision at this time. **Am I hearing you correctly?"**)

## Questioning Skills

**Open and Closed questions** While both open and closed questions are useful in interviewing, it is recommended that practitioners rely primarily on open questions to ensure that the patient has some control over what to reveal [ Egan 1990 ]. Closed questions may be needed to obtain specific information necessary to understand the patient's perspective.



### Open questions

Asks for elaboration or clarification; cannot be answered with yes / no / one word

Practitioner: ("**What else might influence you to take hormones?**")

### Closed questions

Asks for minimal and specific information; can usually be answered with yes / no / a few words

Practitioner: ("**Is your partner supportive?**")

Practitioners can use other skills (paraphrase, reflection of feeling) to respond to the information gathered through questioning. This is advisable to prevent the patient from feeling "grilled" and to communicate that the practitioner has understood the cognitive and affective information provided. If the practitioner feels a need to move away from the person's immediate concern, it is not necessary to use questions. The practitioner can link the response to something the person has mentioned earlier in the interview. For example she can introduce the topic by stating "You mentioned earlier--". Ivey & Bradford-Ivey [ Ivey 2003 ] describe staying with the topic presented by the person or explaining the switch to another topic as verbal tracking, an important aspect of "attending" behaviour. They view attending behaviour as the foundation skill for all other communication skills.

### Sending messages

Messages are sent by **providing information** and **providing feedback**. Information giving responses should be clear and related to the person's situation. The emphasis should be on sharing information and not on advice giving. According to Sundeen, Stuart, Rankin & Cohen [ Sundeen 1994 ] "information giving" allows the patient to supplement his/her own knowledge and often leads to a more informed decision, while "advice" takes the focus away from personal or shared decision making and places it on the practitioner.

Providing feedback deals with the practitioner's perception of a person's behavior. People often tend to focus on past events or future hopes, but may have difficulty dealing with current thoughts and feelings related to those past events or future hopes. In the interaction, the practitioner should try to achieve a balance of focus on the past, present and future (exploring the person's vision of his/her ideal outcomes).

The practitioner should try to maintain a balance between facts and a person's values that influence the decision making. It is also important to focus on the person's strengths (such as the personal and external resources the person brings to the decision making situation, especially for people who tend to focus on the problems associated with the decision.

### Provide information

New information, explanations, teaching, responds to questions

Practitioner ("**If we look at the evidence, the risk would be---**")

### Provide feedback

Provides the person with practitioner's perception of person's behaviour

Practitioner ("**I notice that you have been focusing more on what happened in the past rather than how you are presently dealing with the decision.**")  
Practitioner ("**You seem to have a good grasp of the key facts; you also value input from your partner.**")



## Overall Assessment of the Interaction: Patient/Practitioner-Centered

It is important to determine whether the interaction is patient-centered or practitioner-centered. In a successful patient-centered interview, practitioners use a range of communication skills at a satisfactory level; are able to establish the beginnings of a trusting relationship; and facilitate adequate exploration, understanding and action in relation to the decision being made. Criteria for evaluating patient-centeredness are described below.

### *Strategy:*

### *Intended Interpretation*

Balance between having practitioner vs. patient focus, talk time.

- Not equal focus or use of talk time, but a reasonable balance
- Agenda reflects balance between the patient's and practitioner's thinking and issues

Balance between using questions, listening skills and sending messages.

- Questions not used as the only way to obtain information. (Too many questions make the patient feel grilled.)
- Good use of listening skills or having a talkative patient may decrease need for questions
- Focusing primarily on sending messages (providing information) will reduce listening

Balance between using open and closed questions.

- Generally, more open than closed questions
- May need closed questions with talkative person, to focus the discussion, or to obtain specific factual data

Tailoring the approach to the patient's needs

- Acknowledges patient's questions or situation and provides relevant information (related to needs)
- Determines patient's needs before providing information
- Does not ignore questions or provide unsolicited advice

Tools for practitioners to use in self-assessment of decision support and communication skills, (using the above examples), have been refined and validated by Guimond et al. [ Guimond 2003 ] and revised decision support only by Stacey et al. [ Stacey 2008c ].





## Appendix G. Other Resources

- Ottawa Decision Support Tutorial (ODST) single 178 KB PDF containing all the content of the ODST including all of the appendices and references.
- Ottawa Patient Decision Aids
- International Patient Decision Aid Standards (IPDAS) Collaboration



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