Physicians' Orders for Life Sustaining Treatment (POLST) Evaluation Project

Phase I Preliminary Report

Prepared by: Judy Meyers, Crystal Moore, Melissa Ahern, Alice McGrory, and Jennifer Sparr

DO NOT REPRODUCE WITHOUT PERMISSION OF J. MEYERS

The purpose of this exploratory research was to evaluate use of the POLST in 25 nursing homes in the pilot area of Spokane and Whitman Counties. The pilot implementation began on August 1, 2000. These data were collected during January 2001.

Phase I of the evaluation study was a preliminary examination of the following questions:

1. With use of the POLST, are health care providers and nursing home staff complying with policies related to informed consent?

2. What type of training did nursing home staff receive regarding use of the POLST?

3. Is the content of current POLST forms consistent with nursing home residents' current choices about end-of-life care?

4. Does use of the POLST make residents' wishes more portable to ensure that wishes are not lost as residents move from setting to setting?

5. In the pilot area, how widely is POLST being used in nursing homes?

6. Have Emergency Medical Services encountered the POLST in the field?

7. Do health care providers have problems using POLST? If so, what is causing these problems and how can the problems be resolved?

Population and Sample

Of the 25 nursing homes in Spokane and Whitman Counties who participated in training related to use of the POLST, six granted permission for the evaluation study to be conducted at their facilities. These six were Royal Park, Riverview, St. Joseph’s Care Center, Beverly—Palouse Hills,
the Waterford, and Cheney Care Center. Contact people included Directors of Nursing, social
workers, and administrators. Charts of all nursing home residents who currently have POLST
forms in the participating nursing homes were reviewed, and all available residents who have
POLSTs, or their legal surrogates, were interviewed.

Of the six participating nursing homes, two (Cheney Care Center and The Waterford) had no
POLST forms in use; the remaining four facilities (Royal Park, Riverview, St. Joseph’s, and
Palouse Hills) were found to have a total of 21 valid POLST forms currently in use. The breakdown
of the total number is as follows: Royal Park (n=4); Riverview (n=1); St. Joseph’s (n=6); Palouse
Hills (n=10).

To assess how often Emergency Medical Services encounter the form in the field, EMS
coordinators in Spokane and Whitman counties were asked to track the number of POLSTs
encountered in the field during the pilot period.

Setting

The participating nursing homes were the six facilities that granted permission to study use of
the POLST in their facilities. Five of the six (Royal Park, Riverview, St. Joseph’s, and The
Waterford) are located in Spokane County; one (Palouse Hills) is located in Whitman County.

Procedures

Numerous attempts were made to gain permission to conduct the evaluation study in the 25
identified nursing homes. Six letters of permission were signed, granting permission for research to
be conducted at that facility. IRB approval was obtained at both Washington State University and
Eastern Washington University.
Contact persons at each of the six participating nursing homes were contacted by a research assistant in order to determine the number of current POLSTs being used and to coordinate times for chart review and resident interviews. Contact persons were also told that a research assistant would be contacting them for an interview. One research assistant performed telephone interviews of contact persons from each of the six participating nursing homes. For each interview, the Verbal Consent Script was read, and the Interview with Nursing Home Contact Person was utilized (Appendix A). The interviewer took detailed notes during the interview, transcribed these, and identified major themes.

Chart review was performed in each of the facilities that reported having POLSTs currently in use. Charts of all residents bearing valid POLSTs were reviewed, utilizing the Chart Review Tool (Appendix C). One research assistant conducted all audio taped resident interviews, after determining resident competence for interview, reading consent forms, and obtaining written consent (Appendix B). One resident gave verbal consent due to physical limitations that prevented him from signing. In the event that a legal surrogate had signed the POLST for the resident, an audio taped telephone interview of that legal surrogate was performed. All available residents and legal surrogates were interviewed. The recorded interviews were transcribed, and the interviewer identified major themes.

EMS coordinators were given a questionnaire (Appendix D) to distribute to EMS personnel, that was to be completed when a POLST form was encountered in the field. Personnel were instructed to complete a questionnaire whenever they encountered a POLST form. The completed questionnaire was then to be faxed to the EMS coordinator.
Instrumentation

Data were gathered via interviews and chart review. Open-ended telephone and personal interviews utilized two interview guides. One was for nursing home contact persons, see Appendix A. The other was for nursing home residents, see Appendix B. Interviews with nursing home residents or their legal surrogates were audiotaped. For chart review, the research assistants utilized the Chart Review Tool in Appendix C. The principal researchers developed the Interview Guides used for the nursing home contact persons and the residents/legal surrogates, consent scripts for interviews, consent forms, and the Chart Review Tool.

Interview with Nursing Home Contact Person

Description

The interview with nursing home contact persons was designed to determine what methods of training and education of nursing home personnel had been used, what informed consent processes were specified, what policies and procedures related to POLST use were specified, and problems with using the POLST form. Six open-ended questions were designed to elicit this information.

Validity/Reliability

The contact persons interviewed were individuals who were identified previously by the principal researchers as (1) being familiar with the POLST pilot project and (2) being responsible for tracking POLST use in their respective facilities. All interviews were conducted by telephone by a single research assistant, who took notes during the interviews, and transcribed the audiotapes.
Interview Guide for Nursing Home Residents

Description

The interview with nursing home residents was designed to elicit information regarding the congruency of residents’ end of life wishes as stated with their POLST forms, and issues of informed consent. Two open-ended questions were developed for the purpose of gleaning this information.

Validity/Reliability

Audio taped interviews were completed on all residents who were POLST users, were deemed competent, and were able to communicate. Nurses on duty were asked to evaluate residents’ cognitive abilities to understand interview questions and to communicate adequately for audiotaping purposes. Only residents whose signature appeared on the POLST were considered for interviews. For those residents who were incompetent, legal surrogates whose signature appeared on the POLST were interviewed by audiotaped telephone interviews. A single research assistant performed all resident and legal surrogate interviews.

Chart Review Tool

Description

The Chart Review Tool was designed to evaluate the following: (1) whether the informed consent process was followed, (2) whether residents’ wishes were honored, (3) whether appropriate review had occurred, (4) whether there was evidence of transport across settings, and (5) whether there was congruence with an existing advance directive. A five-question form was developed to elicit this information.

Validity/Reliability
The research assistants who performed chart review met with each other and Crystal Moore, co-principal investigator, to discuss inclusion and operational criteria for coding responses. All charts that contained a valid POLST form were determined to be eligible for review. For chart review purposes, a valid POLST form was one for which the resident was currently residing in the nursing home, and for whom the POLST form bore signatures of both physician and resident/legal surrogate. Operational criteria included the following:

1) evidence that the informed consent process was followed (e.g., documentation of discussion in care conference or progress notes, and/or checks in Part E of the POLST).

2) evidence that the resident’s wishes were honored (e.g., congruence between the advance directive and boxes marked on the POLST, or evidence that medical care was congruent with POLST directions for antibiotics or artificially administered fluids and nutrition.

3) evidence that the POLST was reviewed appropriately (within the appropriate period of time of admission, with significant change in resident health status, or with resident treatment preference change)

4) evidence that the POLST was portable across health settings (e.g., documentation of resident transfers with the form on Part G on the back of the form).

5) evidence that the POLST was congruent with the resident’s advance directive (if advance directive exists, a copy is attached, and care directives are the same as those indicated on the POLST form)

Limitations in reliability of the chart review performed for this study include variations in reviewers’ evaluations that required subjective judgments regarding levels of medical intervention. This bias was limited in that all three of the chart reviewers are registered nurses enrolled in
graduate study and engaged in frequent discussion regarding operational criteria to minimize any variation in interpretation.

**EMS Questionnaire**

**Description**

The EMS questionnaire was developed in consultation with an EMS coordinator from Spokane County. The questionnaire was developed to assess: 1) was the POLST readily available to the EMS professional? 2) Was the form helpful for initial EMS response? 3) Was the form completed appropriately? 4) Were the orders on the form followed by the EMS professional? 5) Did the form accompany the patient if the patient was transferred?

**Validity/Reliability**

EMS personnel attended an in-service on the POLST form and the data collection procedure. In addition, they were asked to complete the questionnaire immediately after responding to a call in which the POLST was present in order to increase the reliability of the reported data.

**Results**

**Chart Review**

Chart review showed that informed consent procedures were followed in 76% of cases (n=16), as indicated by a check in Part E of the POLST, and/or documentation in care conference notes, social services notes, nurses’ notes, or physicians’ progress notes. Five charts lacked evidence of informed consent procedures, with four of these lacking any documentation of discussion of end-of-life issues or completion of Part E of the POLST. One chart indicated in a care conference note that the resident had changed her preference from “DNR” to “Resuscitate,” which was not reflected on the POLST.
POLST Chart Review Data

<table>
<thead>
<tr>
<th>Question</th>
<th>YES</th>
<th>NO</th>
<th>(N/A)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>No. (%)</td>
<td>No. (%)</td>
<td>No. (%)</td>
</tr>
<tr>
<td>1. Is there evidence that the informed consent process was followed?</td>
<td>16 (76%)</td>
<td>5 (24%)</td>
<td>0</td>
</tr>
<tr>
<td>2. Is there evidence that the resident’s wishes were honored?</td>
<td>19 (90.5%)</td>
<td>2 (9.5%)</td>
<td>0</td>
</tr>
<tr>
<td>3. Was the POLST reviewed appropriately?</td>
<td>19 (90.5%)</td>
<td>2 (9.5%)</td>
<td>0</td>
</tr>
<tr>
<td>4. Is there evidence that the POLST is portable across health care settings?</td>
<td>1 (100%)</td>
<td>0</td>
<td>20 (95%)*</td>
</tr>
<tr>
<td>5. Is the POLST congruent with the patient’s advance directive?</td>
<td>12 (57%)</td>
<td>0</td>
<td>9 (43%)**</td>
</tr>
</tbody>
</table>

* Resident had not required transport since POLST initiated  
** Resident had no advance directive

The POLST form was universally congruent with existing advanced directives (only 12 patients had an advance directive). Also, in 19 of 21 cases (90.5%), evidence showed that residents’ treatment wishes had been honored, as indicated by appropriateness of medical interventions and congruence with other advanced directives, including living wills. There were two cases where residents’ wishes were not reflected in the POLST. One involved placement of a feeding tube when the POLST clearly indicated “no feeding tube.” The other involved a clear departure from the resident’s wish in that her decision to be resuscitated was not reflected on her POLST form.

The POLST was reviewed appropriately in 90.5% of cases (n=19). Since all of the POLSTs had been initiated in current facilities within the five months preceding the review, most residents had not experienced a significant change in condition, and the time frame was such that the form had not come up for institutional review.

Similarly, there was little evidence that addressed how often POLST is portable across health care settings, since 20 of 21 residents had not been transferred since the POLST had been
initiated. The POLST form did successfully follow one patient who was transferred to an acute care facility and then re-admitted to the nursing home. This patient’s POLST was appropriately reviewed at the acute care facility and upon readmission to the nursing home. All of the POLSTs studied were initiated at the nursing home in which the resident resided. In other words, no POLST forms transferred with the patient into the facility.

Resident/Legal Surrogate Interviews

Personal or telephone interviews were performed with eight residents/legal surrogates, representing nine of the 21 POLST users (one individual was the legal surrogate for two POLST users). The remainder of POLST users was not interviewed because of communication or cognitive limitations, unavailability, or refusal to participate; legal surrogates were interviewed on the basis of availability.

One research assistant performed all of the (audio taped) resident/legal surrogate interviews. After reading the informed consent script, written consent for the interview was obtained. Two questions were asked: 1) what are your end-of-life wishes? 2) How was the POLST first introduced to you? The interviewer took notes during the interviews, and POLST form indications regarding end-of-life wishes and evidence of informed consent were noted for each interviewee. The interviews were transcribed, and pertinent themes were identified. These included:

♦️ the POLST is more detailed than previous advanced directives
♦️ the POLST adequately reflects end-of-life wishes contained in advance directives
♦️ the POLST seems to be more binding in that it is a physician’s order
♦️ the POLST was introduced by nursing home social worker, nurse, or resident’s physician (or interviewee unable to recall)
- the POLST was explained adequately to residents/legal surrogates
- the POLST is being used to replace previous advance directives in facility, and must be filled out
- residents/legal surrogates feel that there is adequate discussion of end-of-life wishes with the use of the POLST
- the POLST is long
- the POLST could be made simpler
- Some vagueness exists about terms such as “comfort measures,” or cases when antibiotics are for comfort as opposed to treatment, etc.

The POLST appears to have accurately described the end-of-life wishes of the interviewee in all cases, except one. In that case the interviewee was unable to understand the question. All of the interviewees indicated they had adequate informed consent prior to signing the POLST, as indicated by discussion of end-of-life issues with physicians, social workers, or nurses at the facility. Chart reviews, of those interviewed, further indicated that informed consent procedures had been followed.

It should be noted that one nursing home (Palouse Hills) is requiring that advance directives be replaced by the POLST and that the POLST be offered to every resident upon admission. This explains the higher number of POLSTs in that facility.

Contact Person Interviews

A single research assistant interviewed six contact persons from each of the participating nursing homes, utilizing the Interview with Nursing Home Contact Person as a guide (Appendix A).
Notes taken during the interview were transcribed by the researcher. Below is information obtained regarding each question.

1: When use of the POLST form was introduced to your facility, what sort of training did you receive?
  ♦ Training by Sally Denton (Director of Nursing Services at St. Joseph's who developed model policies and procedures for POLST implementation in the nursing home setting)
  ♦ Meetings with DSHS
  ♦ Training by researchers

2: What training did the staff of this facility receive?
  ♦ None
  ♦ Training by Sally Denton (Director of Nursing Services at St. Joseph's who developed model policies and procedures for POLST implementation in the nursing home setting)
  ♦ Training by contact person

3: Was it clear to you, and in the training that your staff receives, that use of the POLST form is optional?
  ♦ N/A – no training
  ♦ Yes

4: When POLST is used in your facility, what measures are taken to ensure that the informed consent process is honored?
  ♦ N/A – none used
Discussion with clients by staff
Discussion with doctor, family, resident, and staff together
Review of form and chart by contact person

5: What policies and procedures, related to the use of the POLST, do you have in place?

- None
- Policy and procedures developed by Sally Denton and DSHS
- Policy and procedures developed by agency staff

6: What types of problems or issues have you encountered in utilizing the POLST?

- Accessibility of physician to have conversation and sign form
- Accessibility of primary care physician to sign form
- Resistance of physician to have conversation and sign form
- Portability of the form
- Ability of the client to sign own form
- Accessibility of surrogate to sign form
- Accessibility to the POLST forms
- Decision making rights when patient and power of attorney disagree
- Time taken to complete form
- Complexity of form – confusing to clients
- Incorrectly completed forms
- Lack of need for the form
EMS Questionnaire

EMS personnel encountered no POLST forms during the pilot period. Hence, there are no results to report on this aspect of the study.

Conclusions and Recommendations

In evaluating the results presented in this preliminary report, it is important to consider the small sample size employed and lack of a comparison group. For example, are the results pertaining to documentation of compliance with informed consent for the POLST typical when compared to documentation of informed consent for other procedures in the nursing home setting? In order to develop of fuller understanding of POLST implementation in the nursing home setting, a larger sample representing more nursing homes should be examined.

Clearly, there is a need for further study related to the implementation of the POLST form. Specifically, increased efforts and resources need to be invested to involve other nursing homes in the evaluation process. Based upon these preliminary findings, there appears to be a need for more training of nursing home personnel related to the appropriate use of the form in that setting. Training related to POLST implementation should also be provided to other stakeholder groups. These include hospice personnel, home health care professionals, and health care providers in the acute care setting. All stakeholders must be involved to fully actualize the positive impact that the POLST form can have on end-of-life care.