

# Professional Doctor of Physical Therapy Students' Perspectives on the Use of an Integrated Standardized Patient Examination



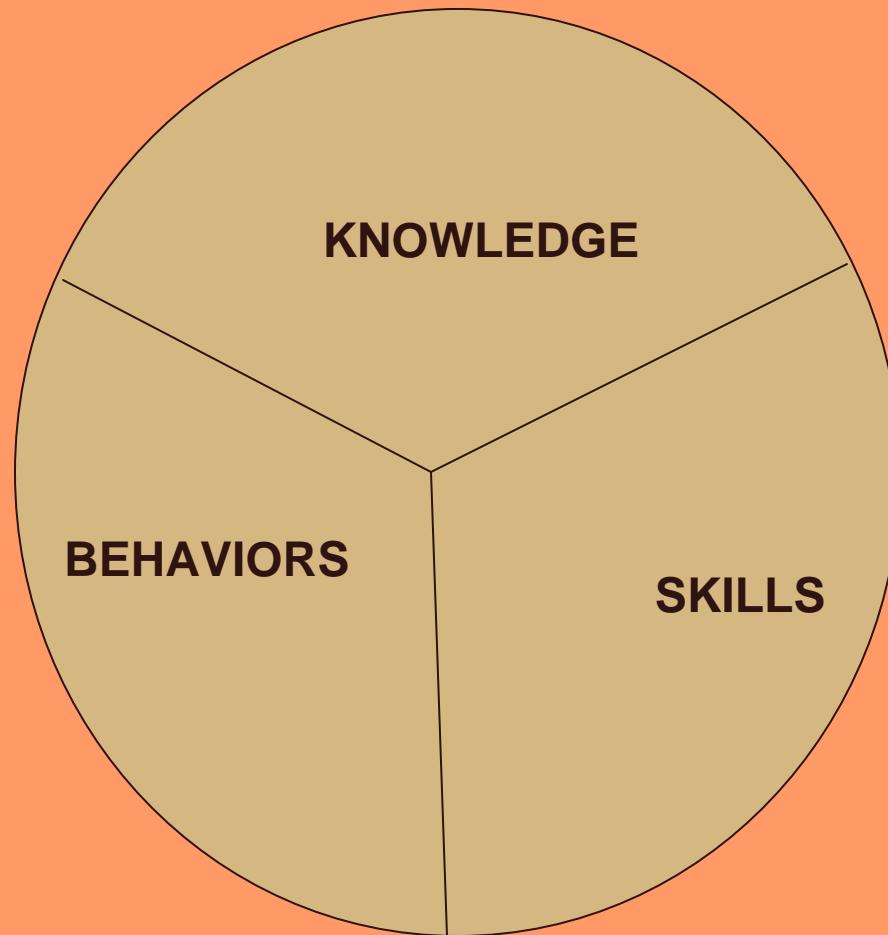
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# Required Competencies for Doctor of Physical Therapy Students

Preparation for autonomous practice in a direct-access environment.



# Emphasis on Behaviors\*

(\*indicators of values, attitudes, dispositions)

## ■ Interpersonal Skills

- Self-Confidence with humility
- Empathy
- Patient-centered interaction

## ■ Communication

- Verbal and Non-verbal behaviors



# Assessment Tools

 Traditional

 Non-Traditional

 Authentic Assessments require:

“...learners integrate needed knowledge, skills and attitudes, coordinate individual skills that comprise a complex task, and transfer their school learning to life or work settings.”

*Audrey Rule  
SUNY Oswego  
Journal of Authentic Learning  
August 2006*

# Standardized Patient Examinations (SPEs)

- Performance-based examinations that simulate real-world patient encounters
  - Used since '60s in medical school
  - More recent attention and application in allied health and nursing programs




<http://alliedhealth.lsuhsu.edu/PhysicalTherapy/images/Kayla%20001.jpg>


# Research on Standardized Patient Examinations

## Assessment of clinical skills

(Ainsworth et.al., 1991; Ebbert & Connors, 2004; Smith et.al., 2003)


-  Reliability and/or validity studies of assessments, rubrics, raters, and SP performance

## Objective Structured Clinical Examinations





-  Short stations which focus on a single skill or set of skills (Harden, 1988)

# Standardized Patient Experiences in Physical Therapy Programs

## Teaching Strategies

-  SPs within academic courses to support students' learning experiences (Black & Marcoux, 2002; Boissonnault, Morgan, et. al., 2006; Hale, Lewis, et. al., 2006; Jensen & Reichert, 2005; Hayword, 2006)

## Standardized Patient Examinations

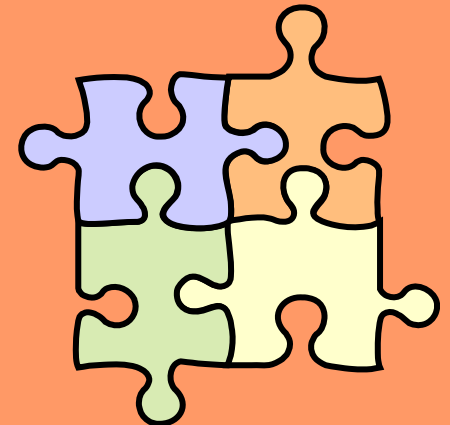
-  OSCEs (Major, 2005; Nayer, 1993)
-  Use of SPs for an extended clinical examination (Ladyshevsky, 2000)
  -  Demonstrated feasibility
  -  Inter and intra-rater reliability; good content, face and construct validity.

## ISPE (Manyon, et. al, 2003; Panzarella, 2008)

# The Integrated Standardized Patient Examination (ISPE)

- Requires students to integrate knowledge and skills across the curriculum.
- Content matched to benchmark competencies.
- Assesses students ability to *demonstrate synthesis of knowledge with communication skills* in a patient interaction.

*Feeley, Manyon, Servoss, Panzarella  
Evaluation & The Health Professions  
June, 2003*








# Development of the ISPE at SUNY UMU

- Faculty participated in case development to ensure face validity of assessment.
- Content linked to core competencies required for first full-time clinical experience.
  - SP Encounter
  - Follow-up written station



# Framework for the ISPE

## Student:

-  Is given a referral and brief patient intake form.
-  Conducts a problem-focused history with patient.
-  Performs a systems review
-  Asks if the SP has any questions
  -  requires students to integrate and apply knowledge conveyed in first year courses.

# Sources of Feedback



## ■ Faculty

- Content, skills and interaction (history taking, systems review, responses to patient questions)
- Scored performance using rubrics
- Provided narrative comments

# Standardized Patient Feedback



- Focused on communication and interpersonal skills
- Scored affective behaviors using rubrics
- Provided narrative comments

\*\*SPs received formal training in providing effective feedback.

# Students' Self-Assessments



## ■ Self-Reflection prompted:

- immediately after examination
- at intervals after ISPE

## ■ Students:

- reviewed feedback from SP and faculty
- viewed own performance on videotape
- developed list of strengths and areas to improve
- drafted goals for upcoming clinical experience

# Purpose of Study

- Extensive studies on psychometric properties of SPEs.
- Limited studies of students' perspectives.
- Research Questions:
  - What do students experience in an ISPE?
  - How do they construct meaning and learning from an ISPE?

# Design: Methods

- Semi-structured interviews
- Pre- and post-ISPE questionnaire
  - All students self-assessed ability to perform benchmark competencies before and after ISPE
  - Assist in selection of students to be interviewed
  - Vehicle to facilitate discussion in interviews

# Methods:

## Semi-structured interviews

- How would you describe the ISPE to an incoming student?
- Students' perspectives of benchmark competencies (pre- and post- ISPE)?
- The videotaped self-assessment experience, SP and faculty feedback?
- The role of the ISPE within the broader context of the DPT program, with regard to student's professional development?


# Data Analysis

- Qualitative data analysis of interview transcripts
- Quantitative data
  - Responses to anonymous questionnaire on students' experience with ISPE

# Results: Common Themes Across Data

- Authenticity of experience.
  - Unpredictable patient encounter.
    - Need to think and act in the moment.
  - Required performance of essential tasks.
    - Formative experiences support readiness for exam.

# Authenticity: Unpredictable encounter

 *“Working with other students, you know you’re faking and you both kind of know what’s going on. In the ISPE it’s all open and it’s just more real. In a patient interaction it’s possible to go in one direction with your examination and not realize whether or not you’ve done anything wrong.” Carla*

# Authenticity: Performance of clinical competencies.

- *“The ISPE is the heart and soul of everything...it’s putting together all the classes so it wasn’t your standard test in one class. It was taking concepts from everywhere and bringing them together and I think that’s what we need.”-Joy*
- *“You’re either ready or you’re not. For other exams you have to recall facts, while for the ISPE you have to be confident with skills that you’ve learned throughout the year and apply them in an environment as close as you can to the clinic.”-Heather*

*“We’ve been sitting there in front of a book, and you know, lectures and notes and stuff and it just all gets thrown at you and you’re not really sure what you’ve taken in. You know, you’re just fumbling with all this information in your head and you don’t know if it all makes sense or not until you get there in front of a patient and all of a sudden you’re just spitting stuff out....putting what you’ve learned and what you’ve been taught and everything into action... it (ISPE) gives you the opportunity to sort things out in your head and show yourself that you kind of do know what you’re talking about.” -Emily*

# Common Themes Across Data: A Learning Experience



- Intentional reflection and specific feedback supported self-assessment (altered or confirmed).
  - Patient and faculty feedback were valued.
  - Assisted identification of learning needs.
    - Skills and behaviors.

# A Learning Experience: Faculty and SP Feedback

*“Faculty feedback was...really good because they analyzed the content of our history. They looked at exactly what we said, exactly what we did...it was also helpful to see what we can improve on, what we did well, also sort of back our ideas up and see what we have to keep working on.”-Janice*

# A Learning Experience

*“It was helpful to me to go back through and watch the video and get feedback from the SP and the faculty...and be able to see the difficulties afterwards...I thought that made the self-assessment a lot better and it meant a lot more because you could integrate everything that you, the SP, and the instructor had gotten.”*

*-Kristina*

# Passing ISPE Signifies Readiness for Full-time Clinical Experience

- Readiness versus increased confidence.
  - Awareness of strengths and weaknesses.
- Negative (or positive) shifts in self-efficacy ratings from pre- to post-ISPE unlinked to readiness for clinic.

# Limitations of Study

- Limited to students' perspectives in one class of a professional Doctor of Physical Therapy program.
  - Findings can not be generalized to all programs.
- Although a variety of students' were intentionally selected not all students' perspectives were included.

# Limitations of Study

- One interview-per-student study design
  - gave up opportunity to return to issues if follow-up interviews were included.
- Need to maintain subject anonymity
  - limited students' input on results and findings.

# Implications for Academic Programs

- SPEs should be linked to coursework and formative learning experiences.
- Educational programs should:
  - Invest time in the training of the faculty and SPs in providing feedback to the students.
  - Include opportunities for students' self-reflection
- Resources (time/cost/equipment/personnel) required must be considered.

# Conclusions

- Evidence that the ISPE (and related activities)

- Assisted students' construction of self-assessments.
  - Feedback from SPs and faculty provided different lenses to view their competencies
- Promoted ownership of unique learning needs.
  - Intentional self-reflection supported students' identification of own strengths and weaknesses.



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# Questions and Discussion



# Results: Student Responses to ISPE “Student Feedback” Questionnaire

	SD 1	D 2	U 3	A 4	SA 5	Mean Rating
The ISPE:						
1. Provided me with a realistic patient encounter.	0	0	3	11	17	4.5
2. Examination was well organized.	0	1	0	14	16	4.5
3. Required integration of knowledge learned across the curriculum.	0	0	0	15	16	4.5
4. Was a beneficial learning experience.	0	0	1	9	21	4.6
5. Strengthened my confidence in patient examination prior to going out on my first full-time clinical experience.	0	0	9	9	13	4.1

Key: SD= Strongly Disagree; D=Disagree; U=Undecided; A=Agree  
SA=Strongly Agree N=31