## APPRAISING PAIN: CLINICIAN-PATIENT INTERACTIONS IN HOSPITAL EMERGENCY DEPARTMENTS

## Suzanne Eggins Faculty of Arts Social Sciences University of Technology Sydney

#### Abstract

In this paper I explore the applications of appraisal analysis to one interactive context in which evaluation is critical: that of clinician-patient interactions in hospital emergency departments. The data analysed was collected by a team from the University of Technology Sydney, led by Diana Slade, as part of a three-year research project into communication in emergency departments in five Australian public hospitals. Adding appraisal analysis (Martin and White) to the SFL analysis of interaction I show how patients and clinicians use appraisal, along with other interpersonal resources, to bridge the gap between patients' subjective experiences of illness and clinicians' objective knowledge of it. Through appraisal, patients can rate and describe their pain. Through appraisal clinicians can elicit key evaluative information, build empathy and show respect for patients, all of which can contribute to a more compassionate and effective outcome. This paper argues that appraisal analysis adds to the SFL account of interpersonal meaning. In particular, by highlighting the evaluative colouring of ideational information that is a defining feature of emergency department interactions it helps explain how patients and clinicians make meanings collaboratively in this critical social context.

Key words: Appraisal, evaluation, interpersonal meaning, medical interaction, clinician patient communication, emergency department communication.

#### RESUMEN

En este artículo se analizan las aplicaciones del análisis de la valoración a un contexto interactivo en el que la evaluación es importante: el de la interacción médico-paciente en las urgencias de los hospitales. Los datos analizados fueron recogidos por un equipo de la University of Technology Sydney, liderados por Diana Slade, como parte de un proyecto de tres años sobre la comunicación en los departamentos de urgencias de cinco hospitales públicos de Australia. Añadiendo el análisis de la valoración al análisis de la interacción de la Lingüística Sistémica se muestra cómo los pacientes y los médicos usan la valoración, además de otros recursos interpersonales, para llenar el vacío entre las experiencias subjetivas los pacientes y el conocimiento objetivo que tienen los médicos de la enfermedad. Este artículo sostiene que el análisis de la valoración contribuye positivamente a la descripción interpersonal de la lingüística sistémica.

PALABRAS CLAVE: valoración, evaluación, significado interpersonal, interacción médica, comunicación médico-paciente, comunicación en las urgencias.

## INTRODUCTION: THE SYSTEMIC ANALYSIS OF SPOKEN INTERACTION

For discourse analysts the systemic functional approach to language has been theoretically powerful. Halliday has long recognised the social semiotic significance of spoken genres, such as casual conversation (e.g. Halliday 40). Systemic functional linguistics (SFL) proposes that the lexico-grammatical systems of interpersonal meaning (principally mood and modality) are primary in enabling dialogue through which, like all text, ideational and textual meanings are simultaneously expressed (Halliday and Matthiessen).

Martin's proposed a stratified view of interpersonal meaning that recognised the discourse-semantic systems of "negotiation" (realised at the discourse level through exchange structure and speech function, and lexico-grammatically through mood and modality) and "involvement" (realised in discourse through systems of terms of address, swearing, technicality and abstraction; lexico-grammatically through vocatives, technical and specialised lexis, slang and taboo lexis and interpersonal metaphor). This gave us expanded analytical tools to explain how tenor dimensions of contact, power and involvement are realised in interaction. Eggins and Slade both demonstrated and extended this model by applying it to authentic examples of casual conversation.

However, Martin and White (7) suggest that this fundamental SFL work on the interpersonal metafunction was 'more strongly oriented to interaction than feeling' and did not account for the demonstrably interpersonal domain of evaluation, including expressions of affect, attitude, judgement, specificity and intensity. In seeking to fill this gap, Martin and White's account of appraisal attempts to describe "the subjective presence of writers/speakers in texts as they adopt stances towards both the material they present and those with whom they communicate" (1). Their presentation is confined to written texts, reflecting the origins of appraisal theory in the analysis of written narratives.

Yet speakers in spontaneous interaction are inevitably and immediately subjectively present, evaluating what they are talking about and who they are talking to. In this paper I explore the applications of appraisal analysis to one interactive context in which evaluation is critical: that of clinician-patient interactions in hospital emergency departments.

Adding appraisal analysis to the SFL analysis of interaction I show how clinicians and patients achieve a collaborative account of patients' subjective experiences of pain. I also suggest that when clinicians acknowledge patient's evaluations they create a rapport that improves the quality and effectiveness of the interaction for all involved.

The data I analyse in this paper was collected by a team from the University of Technology Sydney, led by Diana Slade, as part of a three-year research project into communication in emergency departments (EDs) in five Australian public hospitals. The research team audio-recorded hundreds of hours of interactions, including 82 clinician-patient interactions from the patient's first entry into the emergency department to the time a decision was made to either admit the patient into a ward



at the hospital or to send them home. Details of the project's methodology, recommendations, findings and many excerpts from interactions are available in Slade et al.

Emergency departments (EDs) in Australian hospitals are open 24 hours a day 7 days a week and receive patients from diverse linguistic, social and cultural backgrounds. EDs are complex, busy, often over-stretched workplaces, staffed by shifts of personnel, an increasing number of whom are overseas-trained and/or from non-English speaking backgrounds. Public hospital EDs are training sites for student and junior doctors, and patients are usually seen by doctors and nurses of varying levels of experience and seniority. Staff are required to move patients through the ED as quickly as possible. Although the target set by the Australian government is to have a patient out of the ED within four hours, patients are often there much longer—up to 12 hours is not uncommon if the hospital is 'bed blocked' and cannot admit the patient to a ward.

Slade et al point out that the motivation for the research into communication in EDs is an accumulation of international and Australian evidence that suggests ineffective communication is "a major cause of critical incidents in public hospitals" (15). As communication in EDs is overwhelmingly spoken face-to-face, discourse analysis offers a useful tool to identify and intervene in communication problems.

In their findings, Slade et al note that some clinicians fail to develop any relationship with their patients, which in turn makes it less likely that they will elicit useful information from the patient, arrive at an accurate diagnosis and achieve compliance with suggested treatment. Slade et al recommend a better balance between medical and interpersonal communication and propose strategies clinicians can use to present medical information more effectively and to develop rapport and empathy with patients. The interpersonal strategies suggested range across language levels:

- Genre: e.g. "Share laughter and jokes;" "Demonstrate intercultural sensitivity."
- Exchange: e.g. "Give positive, supportive feedback;" "Intersperse medical talk with interpersonal chat."
- Move: e.g. "Introduce yourself and describe your role" (an astounding number
  of clinicians fail to tell patients who they are); "Recognise the patient's
  perspective."
- Grammar: e.g. "Use inclusive language" such as the patient's name and the inclusive pronoun like *we*.
- Lexis: e.g. "Use colloquial language and softening expressions to put patients at ease" (Slade et al. 12).

The analyses I present below suggest that the skilful and timely use of appraisal resources constitutes another very important strategy clinicians can use to balance their need to find out information very quickly and their obligation to relate to their patients with respect and empathy. First, though, I briefly review what we can say about ED interactions using SFL's core interactive analyses of mood, speech function and exchange.

## CLINICIAN-PATIENT INTERACTIONS: A FIRST EXAMPLE

Consider Text 1 below, an interaction between a nurse and a patient who has presented to the emergency department (ED) suffering from vaginal bleeding following recent radiotherapy treatment for advanced ovarian cancer:

		TEXT 1		
Turn #/ move #	Speaker	Talk () represents inaudible talk		
1	Nurse	So now you've come in with bleeding since this morning?		
2	Patient	I—I was here actually last week.		
3a 3b 3c 3d	Nurse	Yeah, what time did you— did you just wake up and you were already bleeding? When you went to bed last night you were OK?		
4	Patient	No, I also have the bleeding, but ( ) never ( ).		
5	Nurse	Since your treatment, yeah?		
6	Patient	Yeah, but this morning there were clots.		
7a 7b	Nurse	You're passing clots into a pad? Have you got any pain at the moment?		
8	Patient	Little bit.		
9	Nurse	What would you say it was out of 10 ( )?		
10	Patient	Pardon?		
11a 11b 11c	Nurse	What would the pain be out of 10? Ten being hit by a truck, and zero, no pain. What would you say?		
12	Patient	About eight.		
13a 13b	Nurse	Eight. Have you had anything before you came in for pain at all?		
14	Patient	()		
15	Nurse	( ). Are you allergic to anything at the moment?		
16	Patient	Just codeine.		
17	Nurse	Codeine?		
18	Patient	Yeah.		
19a 19b	Nurse	OK.  And apart from your obviously, um, ovarian cancer, have you got any heart or lung problems?		



20	Patient	No, I'm asthmatic.		
21	Nurse	Asthmatic		
22	Patient	And osteoporosis, osteoporosis in my neck, pain in my neck [chuckles].		

The goal of the nurse in this interaction is to elicit the patient's presenting symptoms and determine how urgently this patient needs to see a doctor. On the basis of a short interaction like this, the patient will be triaged into one of five categories—from "life-threatening emergency" to "not urgent"—and will then be placed in what could be a very long queue. When the patient does finally get to see medical staff it will be a junior doctor who will again quiz her on her pain and symptoms. Eventually she will also be seen by a senior ED doctor who will ask her similar questions. The senior doctor must then reach a diagnosis, design a treatment plan and decide whether the patient will be sent home or admitted for treatment in the hospital. The patient in Text 1 was triaged into category 3 and spent six hours in the ED before being sent home with medications.

	TABLE 1: EXCHANGE, MOVE AND MOOD ANALYSIS OF TEXT 1						
	change #/Exchange ucture	Move: mood	Turn		Text /appraisal tokens /modulation/ Circumstances of time, extent, location, manner		
1	Initiate	question:declarative	1	N	So now you've come in with bleeding since this morning?		
	Respond	answer:declarative	2	P	I—I was here actually last week.		
	Follow-up	acknowledge:minor	3a	N	Yeah,		
2	Initiate-abandoned Initiate	question: wh-interrogative question:polar-interrogative	3b 3c		what time did you— did you <b>just</b> wake up and you were already bleeding?		
3	Initiate	question:wh-interrogative	3d		When you went to bed last night you were <b>OK</b> ?		
	Respond	answer: neg polarity+ declarative	4	P	No, I also have the bleeding, but ( ) never ( ).		
	Check	clarify: elliptical declarative + polarity	5	N	Since your treatment, yeah?		
	Respond to check	clarify: polarity + declara- tive	6	P	Yeah, <b>but </b> <i>this morning</i> there were clots.		
4	Initiate	question: declarative	7a	N	You're passing clots into a pad?		
5	Initiate	question: polar/interrogative	7b		Have you got any pain at the moment?		

	Respond	answer: elliptical Residue	8	P	Little bit.
6	Initiate	question: wh-interrogative	9	N	What would you say it was out of 10 ( )?
	Check	question: minor	10	P	Pardon?
	reInitiate	question: wh-interrogative elaboration: elliptical question: wh-interrogative	11a 11b 11c	N	What would the pain be out of 10? Ten being hit by a truck, and zero, no pain. What would you say?
	Respond	answer: elliptical declarative	12	P	About eight.
	Acknowledge	elliptical declarative	13a	N	Eight.
7	Initiate	question: polar-interrogative	13b		Have you had <b>anything</b> before you came in for pain at all?
	Respond	answer [inaudible]	14	P	( )
8	Initiate	polar interrogative	15	N	( ). Are you allergic to anything at the moment?
	Respond	elliptical declarative	16	P	Just codeine.
	Check	elliptical interrogative	17	N	Codeine?
	Respond to check	minor/polarity	18	P	Yeah.
	Follow-up	Minor	19a	N	OK.
9	Initiate	question: polar-interrogative	19b		And apart from your <b>obviously</b> , um, ovarian cancer, have you got <b>any</b> heart or lung problems?
	Respond	answer: declarative	20	P	No, I'm asthmatic.
	Follow-up	acknowledge: elliptical declarative (r)	21	N	Asthmatic
	Respond	answer: elliptical declara- tive	22	P	And osteoporosis, osteoporosis in my neck, pain in my neck [Chuckles].

Table 1 presents a very indelicate analysis of Text 1 for the "core" SFL systems of interactive dialogue: exchange structure, speech function, mood, modality and modulation. The analysis shows that the interaction consists of 8 interactive exchanges (one more, #2, is abandoned and recast by the nurse; in another, #4, the nurse does not pause to give the patient a chance to respond). The exchanges show the tight structure we would predict for the genre of pragmatic talk: Initiations are immediately followed by Responses, with only two "dynamic" or delaying moves in exchanges #6 and #8, where the each speaker checks a prior move before responding. Most exchange slots are realised by single moves, producing short turns. This structure realises a cultural activity where the purpose of talk is to get things done as quickly as possible.

Analysis also shows that the role distribution is highly differentiated—again typical in pragmatic interactions. Only the nurse initiates the exchanges and follows up; the patient contributes only through responses. Almost all the nurse's moves are questions, i.e. demands for information. Almost all the patient's moves are answers. These patterns show that the cultural purpose of the interaction is to exchange information and that the nurse plays a controlling role in the context: she gets to set the agenda and its progress.

The nurse's question are predominantly realised congruently as interrogatives: 5 as wh-interrogatives and 4 as polar interrogatives. This high level of congruence in realising demands for information indicates a directness or matter-of-factness and absence of deference in the role construal. This is further suggested by the almost total absence of modality and modulation. There are no expressions of tentativeness or possibility; the nurse uses would three times to ask about the patient's pain (What would you say it was out of 10?), but this expresses hypothetical meaning rather than politeness. The wh-interrogatives are a limited set: what time, when, what ... out of 10 (which could be glossed as how much). These choices indicate that the nurse is tightly controlling the focus of the interaction, concentrating on a narrow set of circumstantial meanings to do with the patient's symptoms (what time; when). At points where more open questions could be asked with a wh-interrogative (e.g. How do you feel?), the nurse instead uses very specific polar interrogatives, Have you got any pain at the moment?

The patient's responses are more varied in mood than the nurse's, which suggests the patient's efforts to make sure the nurse gets the correct information. The patient does respond with elliptical declaratives and minor clauses five times—compliantly and concisely providing the circumstantial information requested. But the patient also uses full declaratives to correct the nurse's assumptions (*I was here actually last week*) and to amplify her responses after providing the polarity markers that are sought for in the nurse's questions (*No, I also have the bleeding; Yeah, but this morning there were clots*).

Our analysis of interactive choices helps us formulate a critical account of this type of ED interaction. It is highly pragmatic, with no opportunity given or taken for extraneous talk; the direction and progress of the interaction is tightly controlled by the nurse; the patient is compliant but also offers additional details. While direct, matter-of-fact and serious, the interaction is polite. We can also begin to see the possible problems with the interaction.

At a purely functional level, Text 1 is an effective interaction—or perhaps "efficient" is more apt. The nurse gleans what she considers essential information from the patient: when the symptoms started, how much pain the patient is in, her allergy to codeine and her medical background.

However, at an interpersonal level, the text is less effective. The tight structure and limited focus suggest that the nurse does not have moves to "waste" on building rapport with the patient. For example, there are no expressions of empathy (or even interest) in the distressing symptom or high level of pain of a patient with a terminal illness, and no invitations to the patient to add any information she might want to contribute. The patient's use of humour in turn 22 suggests that she would

not object to a more humane approach to her situation. But the nurse continues in the same serious mode. It is a functional but spare interaction.

As mentioned earlier, ED clinicians—especially doctors—work under enormous time pressure and must elicit relevant information from the patient as quickly as possible. The temptation is for them to focus only on the pragmatic informational goal—to determine a triage category or reach a diagnosis—and to dispense with the compassion, respect and sensitivity a patient might expect from those in the profession of "caring" for others.

Does it matter? Faced with the choice between doctors and nurses who are medically skilled but interpersonally inept and those who are interpersonally skilled but medically inept, I'm sure we'd all prefer the first! But must it be an either/or? Can clinicians find out what they need to know from patients while they simultaneously create a human bond and build the rapport that means patients will provide better quality information?

Yes, they can. Many clinicians do demonstrate both clinical and interpersonal skills. But to understand how they do it we need to add appraisal analysis to the picture. If you look again at Table 1, you will notice that Text 1 is rich with tokens of appraisal. Why appraisal should be so important in what at first sight might seem a "factual" and "scientific" context lies in the inherent subjectivity of the information being exchanged and the need for clinicians to somehow bridge the intersubjective gap between patients and themselves, as I now explain.

## SHARING THE SUBJECTIVITY OF PAIN

ED interactions like Text 1 above show that clinical reasoning is an interrogative process—clinicians repeatedly ask patients questions about presenting symptoms to elicit information that allows them to rule certain possibilities in or out. As in Text 1, the extent and severity of pain and the duration and distribution of symptoms are critical information for the clinician to establish and patients to communicate.

Yet pain is an inherently subjective phenomenon: no-one can experience another's pain. Indeed, the body itself is a subjective domain: no-one can inhabit another's body. An observer can only try to read another's subjective experience from externalised signs of discomfort or distress—or elicit their experience through linguistic exchange.

Some of the questions that clinicians ask patients to try to bridge this gap are clearly interpersonally oriented, calling for evaluative responses. For example, when clinicians like the nurse in Text 1 ask patients to "rate" their pain—to describe its severity—they are asking patients to make evaluative, subjective responses.

Other questions clinicians ask are unequivocally ideational. For example, Are you allergic to anything? When did it start? These questions call for "factual" information, and patients usually comply, although they often add subjectivity through interpersonal hedges (*Just* codeine; *about* five o'clock).



But there's a third group of questions that blur the boundary between ideational and interpersonal meaning. Questions like Where is the pain exactly? Has it spread to here or there? and What type of pain is it? How does it feel? Responses to these questions may be ideational in form—functional grammar describes them as circumstances of location and manner—but they cannot avoid being inherently subjective. Patients can only say what they feel the duration, distribution and manner of their pain to be. And so the subjectivity of the "evidence" patients provide colours some of the ideational moves in medical interactions, infusing superficially factual questions and responses with interpersonal evaluation.

I now explain how I adapt Martin and White's model of appraisal to capture these interpersonal dimensions of ED interactions.

### Analysing Appraisal in ED Interactions: Systems and Methodology

Martin and White model the expression of evaluation in three simultaneous systems, of which the most familiar is **attitude**. Through **attitude** we express our feelings (**affect**) judgements (**judgement**) and values (**appreciation**). The second system, **engagement**, is designed to capture how we express our alignment with or distance from other evaluative positions stated or evoked in a text, for example through choices of reporting, modality, modulation, hedging etc.

The third system of **graduation** is concerned with "up-scaling and down-scaling" of meanings from the other two systems. Graduation may be used to scale an **attitudinal** meaning (scaling a token of affect, judgement or appreciation), as in *excrutiatingly painful* (upscale a negative affect) or *slightly sore* (downscaling negative affect).

Graduation of **engagement** has two major axes: grading according to intensity, quantity or extent (**force**) and grading according to prototypicality (**focus**) (Martin and White 137). For example, *massive redness* (upscaling of intensity of a quality), *small bites* (downscaling of a quantity), *dissipate completely* (upscaling of extent), *kind of throbbing* (down-scaling of prototypicality).

Although Martin and White's categories are intuitively useful, many methodological questions come up in analysing interactive discourse that are not answered by Martin and White's narrative-based model. My guiding principle in analysing the ED interactions has been to use appraisal to enrich what I can say about interpersonal meaning in these events. Here are some methodological decisions underlying the analyses presented below.

# Interpersonal Metaphor: Nominalising Pain

Realisations of appraisal as grammatical metaphors are common in ED interactions, where speakers "construe as entities values which might otherwise have been construed as either qualities or as processes" (Martin and White 150). In the ED, clinicians and patients collaborate to achieve their shared goal of diagnosing and

treating the medical problem by regarding the body—its pain and symptoms—as a "thing" to be critically evaluated. This objectifying of pain is one way clinicians and patients can bridge the gap between the patient's subject experience and the clinician's objective awareness of it.

In ED interactions, pain is routinely nominalised. For example, a patient will say I have serious pain here, where pain is nominalised and abstracted. Martin and White (150) describe examples like this as "quantification from the perspective of the lexicogrammar (i.e. the extent) but intensification from the discourse semantic." I code these as intensification of a token of negative affect on the basis that intensification is a consistent "key" across ED interactions.

Once nominalised, pain is also available for evaluation through appreciation. For example, doctors often ask patients Can you describe the pain?, asking them to critically evaluate their pain, almost as a film critic might evaluate a movie. Patients routinely respond with appreciation tokens, describing their pain as sharp or acute or *consistent*, etc. I code these as appreciation.

#### Circumstantial Elements about Pain as Invoked Evaluations

As mentioned earlier, the high frequency of circumstances of extent, location and manner, and their interrogative forms when, where, how long, how much, in discussions of patient pain and symptoms is a distinctive characteristic of clinicianpatient interactions. While these are conventionally analysed as ideational elements, Martin and White (146) note that "circumstances of manner always implicate the speaker/writer's subjectivity" and point to the questions circumstantial elements raise, taking us "to a point in the grammar which is marginal between interpersonal meaning and experiential meaning."

In the clinical context, this marginal point represents a key plank in the bridge between the patient's subjective experience and the clinician's objective diagnosis. When clinicians use circumstantial interrogatives to elicit information about the extent of the patient's pain, the manner of its sensation and its distribution, they are in effect asking patients to give their subjective evaluation of the intensity, acuity and atypicality of their experience. Clinicians need this evaluative information from the patient in order to match it against what they know objectively about disease aetiology to reach a diagnosis. So when a patient responds that the pain started in my back but then spread down my legs or says that it aches all night, the circumstantial adjuncts convey both ideational and interpersonal meaning because they specify the location and extent *subjectively measured* of that affective experience.

An analysis of interpersonal meaning in clinical interactions is not useful or complete unless we note the evaluative role of these circumstantial elements. Where these circumstantial elements target and describe aspects of the patient's pain and symptoms, I therefore treat them as having an interpersonal dimension by listing and coding them in the appraisal column, using categories from the appraisal system wherever possible. For example, when a patient describes pain as descending *down my* arm or across my chest, I show these as circumstantial elements in italics in the text



column and I code them as expressing graduate: extent: distribution in the appraisal column. Because of their primary ideational status, these circumstantial evaluations cannot be scaled up or down. I capture the appraising nature of clinicians' questions—both congruently and incongruently realised—by coding them as requests for appreciation, intensification, extent, duration etc. Where circumstances do not relate to the patient's pain or symptoms (e.g. I came to the hospital last week), they are not coded in the appraisal column.

## Wellness as an Affective Category

Clinician-patient interactions foreground patients' negative affective experiences of pain and ill health, against a presumed norm of wellness and good health. To feel well or to feel pain are affective experiences that are analogous with feeling happy or sad. Martin and White's emphasis on affect as a mental process makes it difficult to situate the more behavioural evaluations of wellness in their model. To capture these attitudinal meanings around health, Martin and White's (51) lists of affect could usefully include a category of "un/wellness."

## The Appraising Token

Many common appraising tokens can construe different appraisal meanings in different contexts. For example, or anything can be amplifying a positive meaning (any redness or anything) or mitigating a negative one (not throbbing or anything); *just* can be downscaling or countering; *actually* can be countering or affirming etc. This means appraisal tokens must be analysed contextually and interactively, i.e. by looking at the turns that precede and follow them. How interactants react to an appraisal token is the most meaningful clue to how it should be classified.

The unit of appraisal—the token—can also vary be a grammatical item (*very* sharp), a single lexical item (sharp pain), a phrase (like it's a heart attack; in waves), a clause (you know it's there) or a clause complex (If ten's being hit by a truck and zero, no pain). Again, context must be the guide to what unit is realising the appraisal.

# Appraisal Analysis in Examples in This Paper

The appraisal analysis in the examples that follow uses the systems from Martin and White, labelling the appraisal category (attitude, engagement, graduation), followed by key choices from the systems for **engagement** (134), **graduation** (154) and relevant categories for attitude (49-56). Upscale and downscale in graduation are abbreviated to up and down. The graduation choice extent:distribution:time is coded as extent:duration as this label is more appropriate. Extent:distribution therefore means distribution in space.

## Strategic Appraisals in ED Interactions

Applying these analytical principles, we find that both patients and clinicians draw strategically on appraisals—principally of graduation but also of attitude and engagement—to present and diagnose medical conditions. For example, consider Text 2, a patient telling her story to the ED nurse:

		TEXT 2	
Turn	Sp/r	Text (appraising token; circumstantial elements in italics)	Appraisal analysis (appraising circumstantials in italics)
1	N	And you're here <i>today</i> for?	
2	P	I um had <b>some</b> stitches put in <i>on Sunday</i> and it was <b>sort of</b> a <b>tricky little</b> uh cut, so they wanted me to come back <i>today</i> <b>just</b> to check on it.	some: graduate/down:quantification:number sort of tricky: graduate/down:focus little: graduate/down:quantification/mass just: graduate/down:intensification:process
3	N	OK. And <i>how's</i> the <b>pain</b> been <i>in the leg</i> ?	pain: attitude/affect:negative:unwell: in the leg: extent:distribution
4	P	It's OK. You know you know it's there but it's not throbbing or anything.	OK: graduate/down:intensification:quality you know it's there but it's not throbbing: graduate/down:intensification: process or anything: graduate/down:focus:soften
5	N	Not too bad? OK. And you haven't noticed any redness or anything around the area?	not too bad: graduate/ down:intensification:quality any redness: graduate/up:focus:sharpen or anything: graduate/up:focus:sharpen around the area: graduate/extent:distribution
6	P	Well I haven't taken it off.	

The analysis shows that while the patient minimises her injury, the nurse maximises her inquiry about possible complications. In turn 2, the patient down-scales both the injury and her reason for returning to the ED. In turn 4 she both acknowledges that she has pain (you know it's there) while also minimising its extent (but it's not throbbing) and denying any possible related problems (or anything). Note that the nurse in turn 5 interprets the patient's minimisation as a downscaling of her symptom. In minimising her reason for returning to the ED (just to check on it) the patient also elides the agency involved: she means so the doctors/you/ED staff could check it. The nurse, on the other hand, upscales, probing for any symptoms that could mean complications (any redness; or anything).

Why is the patient so insistent on minimising her injury, even though it is one that has brought her twice to the ED? I suggest this is partly due to the strong cultural expectations, in Australia at least, that patients should be stoic and not "give in" to pain or—even more taboo in Australia—whinge and make a fuss. Part of 'being a good ED patient' is behaving compliantly and with restraint. "Good" patients understand that EDs are busy places, treating people with often much more

serious conditions. One is expected to show *patient* self-control. A second factor at work in Text 2 is that the patient is telling her story to a nurse—not to a doctor. To see what difference this makes, compare Text 2 with Text 3, which is the same patient's first opportunity to tell her story to a doctor several hours later:

		TEXT 3	
Turn	Sp/r	Text (appraising token; circumstantial elements in italics) == shows points of overlap	Appraisal analysis (appraising circumstantials in italics)
1	D1	So, what <b>seems to be</b> the problem <i>now</i> ?	seems to be: engagement/expand:entertain now: graduate/focus:sharpen
2	P	Well <b>nothing</b> 's the <b>problem</b> . I came in <i>on Sunday</i> .	nothing's the problem: graduate/ down:intensification problem: attitude/affect:negative
3	D1	Mm hm.	
4	P	I had a <b>very deep</b> cut <i>in my leg</i> ==	very: graduate/up:intensification:quality deep: graduate/up:focus:sharpen in my leg: graduate/extent:distribution
5	D1	==Mm hm==	
6	P	== and I came <i>in the ambulance</i> because it was bleeding <b>a lot</b> ==	a lot: graduate/up:quantification/number
7	D1	==Mm hm==	
8	P	==and ah, then Doctor Johnson, or the doctor, ==	
9	D1	==Mm hm==	
10	P	==She It was har—difficult to sort of stitch because of the ==	difficult to stitch: graduate/ up:intensification:process to sort of stitch: graduate/down:focus
11	D1	==Mm hm==	
12	P	== because of the shape of it <b>and every- thing</b> ==	and everything: graduate/up:focus:sharpen
13	D1	==Mm hm==	
14	P	== So, um, she <b>just</b> wanted me to come and have the dressing changed <i>today</i> and to check that <b>everything</b> was <b>going OK</b> .	just wanted: graduate/ down:intensification:process everything: graduate/up:focus:sharpen going OK: attitude/appreciate:positive
15	D1	Mm, OK, good.	

Notice how the patient has changed her story—or rather, how she has changed the *appraisal* in her story. Whether it's the several hours' wait or the fact that she is now seeing someone who can deal with her problem—or both—she is now keen to upscale her injury. By emphasising that her injury was bleeding *a lot* and was *difficult to stitch* she justifies her return appearance in the ED and perhaps tries to get some action from the doctor. However, she is still polite enough to express the actions she needs from the doctor incongruently, again eliding the agency and softening the action: instead of *she told me to come back to get you to change the dressing and check the wound* she says *she just wanted me to come and have the dressing changed*.

The nurse in Text 2 and the doctor in Text 3 elicit this patient's story with open initiating moves very different from the highly constrained questioning of the nurse in Text 1. The Text 3 nurse's question (*And you're here today for ...?*) is a declarative left completely open for the patient to complete. The Text 4 doctor's initiating move is a formulaic but nonetheless fascinating question (*So, what seems to be the problem now?*). A broadly open wh-interrogative it includes a token of expanding engagement (*seems to be* rather than *is*), opening up space for multiple evaluations of the patient's condition. The temporal marker (*now*) functions here as a token of upscaling: a focusing in on the *current* symptoms. So the doctor simultaneously provides space for the patient's story while retaining some control over its focus. No wonder this question is so often used by doctors!

## "Tell me about your pain"—Appraising Patient's Symptoms

After opening the interaction, doctors must use intensive questioning to clarify the intensity, distribution and quality of patients' pain and symptoms. Text 4 below shows a doctor with several years' post-graduate experience doing this very effectively:

		TEXT 4	4
Turn	Sp/r	Text (appraising token; circumstantial elements in italics)	Appraisal analysis (appraising circumstantials in italics)
1	D2	Um, can you tell me a little bit about what happened yesterday?	a little bit: graduate/ down:quantification:presence
2	P	Yes. I'm <b>happy</b> to do that.	happy: attitude/affect:happiness:positive
3	D2	Yeah.	
4	P	Ah You mean when I came in here?	
5	D2	Yeah. Tell me about that pain that you had.	tell me about that pain: request for appreciation
6	P	Well yesterday, it was very early in the morning um I woke up um with pain across my back.	very: graduate/up:intensification:quality pain: attitude/affect:negative:unwell across my back: graduate/extent:distribution

7	D2	Can you tell mewhat was it like? Can you describe it at all?	what was it like: request for appreciation at all: graduate/up:quantification:presence
8	Р	I've tried this <i>before</i> um <b>Not really sharp</b> but <b>acute</b> .	not really: graduate/ down:intensification:quality sharp: attitude/appreciate:negative acute: attitude/appreciate:negative
9	D2	OK.	
10	P	Um and consistent?	consistent: attitude/appreciate:negative
11	D2	Did it go anywhere else other than across your back?	anywhere else: graduate/up:extent:distribution other than across your back: graduate/extent:distribution
12	P	No.	
13	D2	OK. And was it <b>absolutely non-stop</b> ? Or did it come <b>in waves</b> ?	absolutely: graduate/up:intensification:quality non-stop: graduate/up:intensification:process in waves: graduate/down:intensification:process
14	P	No, it was non-stop.	non-stop: graduate/up:extent:distribution
15	D2	OK. And <i>how</i> did it get <b>better</b> ? Did it <i>gradually</i> get better?	how get better: wh-request for ttitude/ appreciate:positive gradually get better: gradu- ate/down:intensification:process
16	P	Yeah. It um seemed to <b>dissipate</b> from the outside and took at one stage, ( )	dissipate: graduate/down:intensification:process from the outside: graduate/extent:distribution
17	D2	OK. And then did it go away completely?	completely: graduate/up:extent:distribution
18	P	Yeah.	
	D2	How long did it last about?	how long: wh-request for extent about: graduate/down:extent:distribution
19	P	I'd say altogether somewhere between two and a half to three hours.	I'd say: engage/expand:entertain altogether: graduate/up:quantification:mass somewhere: graduate/down:extent:distribution
20	D2	Oh. And have you <i>ever</i> had a pain like that <i>before</i> ?	have before: request for extent ever: graduate/up:intensification:quality
21	P	No.	

In Text 4 we see the doctor coaxing from the patient the information he needs to understand *that pain that you had*, i.e. the patient's negative affective experience. The patient begins by offering tokens of appreciation, viewing his pain as a thing separate to his feeling of it. But as we see from the graduation questions from turn 11 onwards, what the doctor is really interested in is the pain's extent, intensity and distribution (*Did it go anywhere else? Was it absolutely non-stop? Have you ever had a pain like that before?*). The patient complies by providing the gradua-

tion information the doctor needs, with some hedging through modality (*it seemed to; I'd say*). Notice how the doctor, having begun the interaction with an open invitation to the patient to describe the pain, then helps the patient (and himself) by offering alternative expressions of manner and extent (*non-stop* or *in waves*) and prompts (*gradually; completely*).

To elicit some graduation of pain clinicians often ask patients to scale their pain from one to ten, sometimes offering concrete (if unrealistic) similes, as we saw in Text 1. In response, patients often provide graphic similes of their own, as does the patient in Text 5 when answering a junior doctor's inquiry:

	TEXT 5				
Turn	Sp/r	Text (appraising token; circumstantial elements in italics)	Appraisal analysis (appraising circumstantials in italics)		
1	D1	Yeah. What's your pain like <i>now</i> out of ten?	whatout of 10: request for extent		
2	P	Probably <i>about five</i> .	about: graduate/down:intensification:quality about five: graduate/extent:number		
3	D1	OK. Ah			
4	P	I feel like I've got a screwdriver up my backside most of the time.	like backside: graduate/ up:intensification:process most of the time: graduate/up:extent:duration		
5	D1	Yeah, ah look it's <b>ghastly</b> . It's one of those things where you know, you ha—there's <b>not much</b> to show for it, but they're <b>dread</b> —you know people have <b>such discomfort</b> it's <b>awful</b> .	ghastly: attitude/appreciate:negative not much: graduate/down:quantification:mass such discomfort: graduate/up:intensification discomfort: attitude/appreciate:negative awful: attitude/appreciate:negative		

Striking here is the way the doctor demonstrates empathy with the patient by offering several appreciation tokens that recognise the patient's own intensifications. These are empathetic rather than sympathetic because the doctor also treats the patient's pain as a thing that can be assessed, rather than presuming to know the feelings of the patient (compare *it's awful* and *you feel awful*).

### Appraisal and Rapport

ED interactions reveal that appraisal is central to bridging the gap between patients' subjective experience of their pain and clinicians' objective awareness of it. For clinicians, it's critical to ask the right questions: questions that tap into patients' subjective experience of their pain's intensity, duration, manner and extent. As the examples above show, clinicians can use appraisal to create an open and empathetic context. Senior clinicians appear particularly skilful in mobilising appraisal resources to explain their diagnosis and treatment to the patient. In text 7, a senior consultant has completed his examination of the patient and now delivers his diagnosis. The



patient, a long-term MS (multiple sclerosis) sufferer, presented to the ED convinced he had a serious illness over and above his MS:

		TEXT	6
Turn	Sp/r	Text (circumstantial elements in italics)	Appraisal analysis (circumstantials in italics)
1	D	Yeah. OK. Well, listen, I guess in terms of the results that we see, they look fine, OK. Your blood count is completely normal, inflammatory markers are not exciting. There's nothing that would suggest that you've got an underlying infection or anything, which is always a worry with the symptoms that you're describing.	I guess: engage/expand:entertain in terms of the results: graduate/focus fine: attitude/appreciate: positive completely: graduate/up:intensification:quality normal: attitude/appreciate: positive not exciting: attitude/appreciate:positive nothing: graduate/down:quantification:mass suggest: engage/expand:entertain or anything: graduate/down:focus always: graduate/up:quantification:extent a worry:attitude/appreciate:negative with the symptoms: graduate/extent:distribution
2	P	It is for me, yeah.	
3	D	Um, and you know, everything from that point of view looks alright. My bigger concern probably is that, you know, you've got a disease that is scary and all the things that you're describing are probably, you know, kind of mentally consistent with you being under quite a bit of stress with all of this. Um	you know: engage/expand:acknowledge everything: graduate/up:quantification:mass alright: attitude/appreciate:positive bigger: graduate/up:intensification:quality concern: attitude/appreciate:negative probably: engagement/expand:entertain scary: attitude/appreciate:negative all the things: graduate/up:quantification:mass probably: engagement/expand:entertain you know: engage/expand:acknowledge kind of: graduate/down:intensification:quality consistent: attitude/appreciate:positive quite a bit: graduate/up:quantification:mass
4	P	Yeah.	
5	D	Which I think may be part of this. Um	I think: engagement/expand:entertain may be: engagement/expand:entertain part of: graduation/graduate/down:focus
6	P	Yeah.	

Here the doctor needs to deliver a diagnosis that the patient might be resistant to. He needs to tell the patient that his symptoms are stress-related and do not indicate a new organic disease. He prepares the ground in turn 1 by intensified positive assurances that there is no other medical problem. In turn 3 he then carefully uses appraisal to soften the diagnosis, with many tokens of engagement indicating that this is just one possibility, implying a respect for others (like the patient) who may have thought otherwise. Simple words like the everyday appreciation token

scary reinforce his empathy with the patient. Because this doctor has built rapport with Jack through humour and openness in earlier moments of the consultation, the patient accepts the doctor's diagnosis and leaves the hospital reassured.

If we return to Text 1, we can appreciate now that while the nurse elicited evaluations from the patient, she did not at any stage acknowledge the interpersonal meaning in the patient's responses. A simple response to the patient's rating of her pain as pretty severe (8 out of 10) would have humanised the interaction considerably—an offer to provide pain relief promptly might have been even better. The nurse's awkward and almost dismissive final question (And apart from your obviously um ovarian cancer, have you got any heart or lung problems?) construes the patient's terminal illness as something to be excluded from the interaction rather than recognised as central to it: Instead, the nurse could have given the patient's illness the lexico-grammatical status it deserves and said: Now, I've noted the details of your ovarian cancer, thank you. I also need to ask you, have you got any heart or lung problems?

#### CONCLUSION

In the ED, patients and clinicians use appraisal, along with other interpersonal resources, to bridge the gap between patients' subjective experiences of illness and clinicians' objective knowledge of it. Through appraisal, patients can rate and describe their pain. Through appraisal clinicians can elicit key evaluative information, build empathy and show respect for patients, all of which can contribute to a more compassionate and effective outcome.

As I hope this paper has shown, appraisal analysis adds to the SFL account of interpersonal meaning. In particular, by highlighting the evaluative colouring of ideational information that is a defining feature of ED interactions it helps explain how patients and clinicians make meanings collaboratively in this critical social context.

### WORKS CITED

EGGINS, Suzanne, and Diana Slade. Analysing Casual Conversation. London: Equinox, 2004.

Halliday, Michael Alexander Kirkwood. Language as Social Semiotic. London: E. Arnold, 1978.

HALLIDAY, M.A.K., and Christian Matthiessen. An Introduction to Functional Grammar. London: E. Arnold, 2004.

MARTIN, James R. English Text: System and Structure. Amsterdam: John Benjamins, 1992.

MARTIN, James R., and Peter R.R. WHITE. The Language of Evaluation: Appraisal in English. London: Palgrave, 2005.

SLADE, D., M. MANIDIS, J. McGregor, H. Scheeres, J. Stein-Parbury, R. Dunston, N. Stanton, E. CHANDLER, C. MATTHIESSEN, and M. HERKE. Communicating in Hospital Emergency Departments. Sydney: University of Technology Sydney, 2011. Executive summary and full report available at Jun. 1 2012 <a href="http://www.rilc.uts.edu.au/projects/emergency-">http://www.rilc.uts.edu.au/projects/emergency-</a> communication.html>.

