A Possible Typology of Case Studies in the Feldenkrais Method 1.

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A tension exists in neurology between those who believe that the most valuable lessons about the brain can be learned from statistical analyses involving large numbers of patients and those who believe that doing the right kind of experiments with the right kind of patients – even a single patient – can yield much more useful information. This is really a silly debate since its resolution is obvious: It's a good idea to begin with experiments on single cases and then to confirm the findings through studies of additional patients. (Ramachandran and Blakeslee, p. xiii)

Why case studies?

Case studies are used in a great variety of fields and reflect a wide range of research methods, styles of reports, purposes, etc. A case study can be described as a study of a single system, person, event, program, etc. They may include qualitative, quantitative or a mix of different kinds of data. Moshe Feldenkrais was familiar with and often referred to thinkers who make powerful use of case studies and histories (including A.R. Luria, Konrad Lorenz, Sigmund Freud, Charles Darwin, Jean Piaget, Milton Erikson, amongst others). He used 'teaching stories' extensively in his writing and in the training programs he conducted in San Francisco and Amherst. The wonderful and informative book The Case of Nora (Feldenkrais, 1977) was just the first of a series of case studies he had planned.

Interestingly the early volumes of the Feldenkrais Guild of North America's <u>Journal of the Feldenkrais Method</u> featured many case studies. A few of these were also included in the <u>IFF Journal</u>, which published two volumes completely composed of case studies. Perhaps it is understandable, in those early days of practitioners (other than Feldenkrais himself) writing about the method, that they chose the narrative case study as an accessible form.

As a professional community it would seem that we still place value on case studies, and to some extent support a culture of writing case studies. This may be reflected in the fact that case studies are part of the requirements for advancement to become a teacher of Feldenkrais teachers – in the assessment requirements to become a Feldenkrais Assistant Trainer and Trainer Candidate.

Observation and documentation are fundamental to the development of any practice, including science. The natural sciences are based on hundreds – or thousands – of years of naturalistic observation before the development of the repeatable studies, sophisticated instrumentation and the formulation of the laws we associate with the 'hard' sciences. It is hardly surprising that the typical

narrative case study, with its emphasis on observation and description, was a common form in the early days of our reflection on the new kinds of human knowledge generated by the practice of the Feldenkrais Method.

Some approaches afforded by case studies

Case study based research affords some unique possibilities not always offered by other approaches. In choosing to emphasize some of these possibilities, the author-researcher makes some key decisions as to what kind of research is done and what kind of case study will be written. For example:

Case study research can be a practical, accessible form of research. As Alan Fogel has said, 'Research is not so far away...'. ². When writing a narrative or a reflective case study, it is close to what we already do in practice, such as reflecting on our practice, take notes, etc. Most such case studies will not need a lot of preparation, large team, lots of funding, etc.

Case study research suits the complexity of professional practice. Professional practice is always unique. Case study research can capture things about the practice of the Feldenkrais Method that other kinds of research may not (Jarvis, 1999), such as our 'reflection-in-practice' (Schön, 1983). A case study can allow for the study of complex relationships between the practitioner and student, the person and their environment, their history, 'variables' in the 'intervention', 'clinical' decision-making, etc. Here reflection is emphasised.

Sometimes a single case can be as valuable as a population study. In some areas of knowledge more understanding can be gained from studying unique cases than population studies, averages, etc. (Ramachandran, 1998; Sacks, 1995). Both the study of a single person and the situation, or the study of a single 'intervention', can be very illuminating. Here the singular throws strong light on the whole field of enquiry.

In a case study, a researcher's experience can be included as part of the research process. Feldenkrais practice almost always involves the presence of a live teacher-practitioner. ⁴ Consistent with anthropological, qualitative and phenomenological approaches to research, a case study can include the practitioner's own experience, potentially bringing forth deep reflection on the process. (Meriam, 1998; Joly, 2004). Description and reflection are central to this approach.

The subject's (client's or student's) experience may also be included. Such a case study may include sections of a journal or interview material from a client. A project could also be done collaboratively with clients or students using a 'new

paradigm research' model (Reason and Rowan, 1981). The aim is again reflective, providing multiple perspectives on the phenomena under study.

It can trace the progress of the person or process. The Feldenkrais Method involves learning and development. Case study research can capture a variety of changes over time and explore their interrelationship. This could be done in a narrative form, or as a single case research design, for example, using an A (pre-test), B (intervention), A (post-test) design to administer a variety of appropriate measures (eg. quality of life questionnaires, range of motion tests, etc.).

Intentions and audiences

The intentions we have for our case study research, and the intended audience, will have a major influence on the kinds of case studies written.

Two of the most common questions of our Feldenkrais students and clients are 'what is it like?' and 'how will I benefit?'. If we are thinking about informing the public about the Feldenkrais Method, case studies using everyday language, and a narrative form, can provide effective description of the process and outcomes of the Method.

For research into our own practice, case studies by teacher-practitioners can afford both the writer and reader:

- a better understanding of the Feldenkrais Method itself, and our practice;
- a chance to improve our own and our colleagues practice;
- a way to clarify relationships between theory and practice.

For research into our own practice, a mix of description of actual practice, with reflection on different aspects of the theory underlying the Method, may be the most effective form for a case study.

For research into the Method and the outcomes of its use, case studies can provide information and ideas toward further and better research, including better research questions, methodologies, tools and measures, etc. To paraphrase Alan Fogel, 'if you don't know what the intervention is you won't be able to know what outcomes to measure'. ⁴ Researchers with whom we hope or plan to collaborate may get a better feel for the Method from the 'thick description' of a descriptive case study. They may also get ideas for appropriate research strategies from a case study using, for example, a mix of documentation of the intervention, outcomes surveys and qualitative data such as interviews with students or clients, as well as any quantitative data collected and the tools used to collect it.

Sources of data

The types and sources of data chosen for any case study will have a major impact on the type of study written. And conversely the type of case study one intends to write critically affects the data collection processes needed.

Some possible sources of data for Feldenkrais case studies could include:

- 1. Practitioner notes, diary, interviews and dialogues with co-researchers, or commentaries on documentation, eg. Joly project (Joly, 2004). 'New paradigm research' puts forward the value of the including the voices of other researchers (such as other practitioners) and participants (such as clients or students). For example, a case study written by Barbara Pieper, includes contributions both from her as the practitioner and the client. ⁵.
- 2. Client or student diaries, evaluations, interviews, questionnaires, standardized measures (for example of mood, of locus of control), or quality of life measures (such as the SF 36 and many others)
- 3. Objective measures of client or student movement (eg. video/digital motion analysis)
- 4. Audio-visual documentation (eg. video of Functional Integration, eg. Joly project (Joly, 2004)
- 5. Relevant literature, for example: Feldenkrais documents (eg. published Awareness Through Movement lessons that relate to described Functional Inetegration), Feldenkrais concepts, other case studies, empirical studies, research and theory from other domains (eg. neuroscience, biomechanics, psychology, education, linguistics, the arts, philosophy, etc).

Interestingly, in the study of anthropology, field (case) notes are written into anthropological monographs in the context of the ongoing development of anthropological thought and development of anthropological theories (Geertz, 1973). In this way, case studies are 'the literature' of that discipline.

Another approach is to collect different kinds of data. One example of the use of mixed measures in Feldenkrais research can be found in the single case research design developed by Stephens, et al. That study involved a literature review, brief descriptions (case histories, biographies and demographics) of participants, qualitative feedback from participants (self-reports), video motion analysis of movement activities, documentation of Awareness Through Movement class themes and content (in the form of excerpts from transcripts of audio recordings), standardized measures of impairment, indexes of well being, and questionnaires with open-ended questions. It also included pre-program (base

line) and end of program testing and data collection. That is, the methodology used an 'ABA' (pre-test, intervention, re-test) design.

A possible typology of Feldenkrais Method case studies

In this possible typology four kinds of existing or putative Feldenkrais case studies have been identified:

- Narrative/Naturalistic;
- Reflective
- Mixed Measures (qualitative and quantitative) Case Stuy with Single or multiple cases
- Single System Research Design (experimental model),

and mapped against a set of criteria or descriptors:

- *Selection of subject(s)*
- Number of subjects
- Researcher
- Research questions
- Data Collection
- Practitioner experience
- Relationship to theory and other sources
- Reflection on language/terminology
- Style of 'argument' in the case report
- Style of published report
- Main uses
- Examples in the Feldenkrais literature

to map out the characteristics, possible uses and benefits, of each type.

	Narrative /Naturalistic	Reflective	Mixed Measures (qualitative & quantitative) Case Study (single or multiple cases)	Single System Research Design (experimental model)
Selection of	Subject selected	Subject(s) selected	Probably selected	Probably selected
subject(s)	by researcher-	by researcher-	against criteria	against criteria
	practitioner	practitioner		
Number of	Usually one	One or more	Single (N=1) or	Single (N=1) or
subjects			multiple	multiple
Researcher	Single	Single practitioner;	Multiple	Multiple
	practitioner; peer	peer reviewed for	researchers	researchers
	reviewed for	publication;	(practitioners &	(practitioners &
	publication	Possibly include	others); Reviewed	others);

Research questions	Likely to be no theory-testing intent	client-student explicitly (eg. Pieper, in this Journal) May be explicit or generated by the study	by peers & people in other fields for publication Research issues discussed & explored; May include a formal literature review	Reviewed by peers & people in other fields for publication Hypothesis explicit & stated; Formal literature review
Data Collection	Practitioner observation & note taking; Client reports of situation as reported by the practitioner; Data treated as non-problematic	Practitioner observation & note taking; Readings of relevant literature. Possibly documentation, eg. photos	Quantitative or qualitative, or a mix; May include pre-test & post-test data, as well as collection throughout or at end of intervention, Documentation of process	Base line data established before intervention, plus data collection through or at end of intervention, eg: ABABA, etc. May include multiple interventions, eg. ABACAD, etc.
Practitioner experience	Essential	Included, may be explicitly reflected on	May be included, but likely to be formal documentation of practitioner input	More likely to be formal documentation of practitioner input
Relationship to theory & other sources	Mostly implicit, & sometimes explicit, reference to ideas of the Feldenkrais Method	Explicit reference to theory from Feldenkrais Method & other domains (eg. neuroscience, medical or arts literature)	Reflection on theory, generation of research questions from documentation, measurement & discussion	Testing of theory or predictions from base line
Reflection on language/terminology	Language & terms treated as non- problematic	Language & terms may be reflected upon	Terms defined	Terms defined
Style of 'argument' in report	'Arguments' about process, outcomes, efficacy, variables mostly made through narrative structure & description; Use	Switching between descriptive & reflection/ interpretation; Assumptions made explicit ('bracketed'), may include researcher	Blends reflection on documentation of the intervention, outcomes of qualitative & quantitative measures	Presentation of statistical results (eg. over time, baseline, before & after interventions) & interpretation of those results

	of literary tools.	reflection on process; Use of documents (<i>Joly</i> , 2004)		
Style of published report	Richly descriptive	Switches from description to reflection on theory/theory generation	Combines literature review, presentation of documentation & results of measurements, discussion of results	Combines literature review, presentation of results of measurements, discussion of results
Main uses	Basic documentation /research into practice, Promoting the Method	Reflection on practice & relationship to theory; Suggestive of further research themes	Documenting outcomes; Identifying further research themes & tools	Documenting outcomes; Identifying further research themes & tools
Examples in the Feldenkrais literature	Many case studies in Feldenkrais journals	Feldenkrais (<u>The</u> <u>Case of Nora</u> , 1977), Rywerant <u>The Feldenkrais</u> <u>Method</u> , 1983), Beringer in 'Heather' and 'Self-Imaging' (1997, 2001), Ginsberg 'Roots of Functional Integration' (1987,	Stephens, et al, 2002	

Some final reflections

The above is only a very preliminary schema, but I hope it provides a rough guide to where we have been and where we might go in terms of case study based research. Like all travel guides it can only be of value of if it is used and updated with input from the users. Please send me any feedback on this typology and its possible uses.

1988, 1992)

I am a believer in the value of writing case studies for the development of ourselves as practitioners. I also believe case studies have ongoing value for the development of our understanding of the Feldenkrais Method and the development of our research agenda. I would love to see the further publication

of already written and new case studies as part of this Journal or as a separate project of the international Feldenkrais professional community. Perhaps there are some practitioners interested in working on such a project?

In the mean time: reflect, take some notes on a client or a session or a class, talk with a colleague, rough out some ideas about a research project...

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Please send me your feedback and suggestions. I can be contacted through my websites www.feldenkraissf.com or www.learningforhealth.com. CS.

Notes

- 1. This article is based on a presentation at the Research Forum at the FGNA Conference in Seattle, Washington in 2004, and therefore an audience primarily of Feldenkrais practitioners. I was only able to review case studies in the English language. I look forward to ideas and responses from Feldenkrais teachers who write or teach how to write case studies in other languages. Thanks to Pat Buchanan and Jim Stephens for their assistance with editing the original presentation. Thanks to Deborah Bowes and Staffan Elgelid for editorial suggestions for this article.
- 2. & 4. From my notes of Alan Fogel's talk at the symposium on research and the Feldenkrais Method, 'Movement and the Development of the Sense of Self', Seattle, August 2004.
- 3. Some people, for example, experience Awareness Through Movement from recordings. Some controlled studies of the effects of the Feldenkrais Method have chosen to use a recorded Awareness Through Movement lesson as a way to 'standardize the intervention'.
- 5. Published in this volume of the Feldenkrais Research Journal.

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