

## **FIRST MORNING SESSION: Medicinal Plant and Observation Skills Lab**

TIMES and DATES: 9:15 – 10:30 am, SUN 4.28 to FRI 5.3, 2019

COURSE LEADER: Adam Blanning, MD

DESCRIPTION: Good observation and accurate description are fundamental skills in medical practice. The goal of good observation is to become aware of what is objectively present. This course is designed to help us to become aware of those biases and preconceptions, and to learn to see with more and more accuracy: in other words, to discipline our observational skills. Secondly, we need language with which to describe our accurate observations. Our normal speech often contains preconceptions based on language, of which we are not aware.

A scenario illustrating biased observation is that of a patient complaining of “acidity in my throat,” assuming he has a gastric acid-reflux problem. But if a doctor correctly observes during a physical exam, the patient will be seen to have a lesion at the posterior of the soft palate. The patient ultimately is biopsied and proved to have a squamous cell carcinoma. The doctor needs to observe accurately without bias based on prevalence, the patient’s assumptions, the patient’s previous diagnoses, etc.

Assumptions buried in language are exemplified by many physical exams beginning, “well-nourished, well-developed, looking his stated age.” Have we truly looked at our patient? Or do we simply bring a mental and linguistic formula, forgetting to really look?

In medical specialties such as pathology, radiology, and dermatology, doctors are taught well to observe and practice those skills many times a day. In more analytic specialties, doctors may lose the skills of neutral, careful observation and open language that is free or relatively free of preconceptions.

In these six “laboratory” sessions we will learn to observe and to describe, as absolute prerequisites to integrative medical practice and to excellent medical practice in general. We will do this by means of studying medicinal plants. Drawing or sculpting exercises may be included to demonstrate certain aspects of growth or change in the plants. Lessons learned through these observation labs (exercises) will also be applied to the skill of observing patients well.

### **PROCEDURE:**

In this workshop, each participant will observe and study a medicinal plant each day. The perspective from which observations are made will change daily.

The plants the participants will be asked to observe are those whose biomedical effects have been described in peer-reviewed literature. They may also have traditional medicinal uses. Some plants will have toxicities which also are known and understood.

Each day participants are required to make direct observations, to accurately record them, and then to gather our observations and draw appropriate conclusions, in small groups. Small groups will be led by physician-facilitators. Participants will be asked to document their experiences in a laboratory-report format. They will each prepare a short report on their conclusions, using medical and botanical literature available in the campus library and via the internet, to be shared in the last session.

Relevant literature will be supplied to the whole participant group.

### **Day 1 Lab: Accurate Observation and Description**

Each small-group is assigned to one medicinal plant.

- Obtain a first impression and record it.
- Systematically observe the plant for 15 minutes:
  - Observe its setting, relationship to its surrounding soil, other plants, terrain.
  - Note accurately the various plant parts and their spatial relationships (stem, leaves, flower, etc. If possible dig up one plant to observe the root.
  - Note color, odor, and other visual, tactile, and olfactory features
- The group will together describe the plant with the greatest accuracy possible.
- Observe the same plant again, 10 minutes: look at what you have misperceived and correct your perception. See if this time, you can see more of what is there: details you overlooked; spatial features you did not know how to describe; detail of relationship of plant parts.
- In the classroom the group records observations and accurately draws the plant in their lab notebooks.

### **Day 1 Objectives:**

Distinguish between accurate and biased observation of static spatial features

Learn the value of individual observation and the role of group discussion of common objects of observation, as a means of correcting biases.

Discuss and consider the relevance of today's work to daily patient-care.

**Day 2 Lab: Growth and Development:** observing changes in time based on current data.

- Out of doors, participants are assigned to look at the plant *in situ*, for clues as to how it may have grown (small leaves and larger leaves, closed buds and opening buds, open flowers to wilted flowers, signs of fruit beginning to develop – more fully developed fruit, young plants vs. more mature plants in the vicinity).
- Observe and think in silence; invite “theories” as to its possible developmental steps.
- Each participant is asked to create in his or her mind a moving visual image of the plant’s development in time, based on observation.
- The group is led in discussion of the plant’s likely growth process. When this has gone as far as possible someone summarises the whole growth process (or the facilitator does so).
- Consider following a patient over time; what signs do we compare from one visit to the next?
- The group returns to the classroom to record its procedures and findings in the lab notebook.

### **Day 2 Objectives:**

Practice observing a biological process in time.

A few in the group agree to study that plant’s growth and development and report back to the group

Discuss and consider the relevance of today’s work to daily patient-care.

### **Day 3 Lab: The physician’s response to the moods and emotions of patients.**

Concept: Today’s lab examines what in psychiatry is termed counter-transference, i.e. the well-studied therapist’s reactions to the client which may say something about the client themselves and not merely about the therapist’s psyche. It has value for health professionals in training self-awareness, and in identifying a patient’s mood and emotion. For this exercise, participants are asked not to question their responses; their job is to accurately observe and then be able to describe them to themselves. Literature on counter-transference and emotional self-awareness as a clinical tool, is provided.

Procedure:

- Observe the plant (15 minutes). Observe and note reactions and inner state: asking oneself, what do you feel is the mood of this plant – as if it was a person? How does the plant make you feel? Can you say something about the plant’s “personality”?
- The group is invited to share what they have noted. Each person is free to share or not per their comfort level. It is important to value everyone’s contribution however divergent or strange sounding. Conclusions vs. commonalities or multiplicity of responses – are discussed.
- Optional artistic exercise may be done: participants may be invited to cite or write a poem, draw a picture, or capture in some way the mood and emotion they have already described objectively.
- Discussion: Relevance (or not) to daily patient care. Compassion and empathy. Healthy boundaries. Therapeutic role of the arts in health care.
- Lab written up during or after the session.

### **Day 3 Objectives:**

Accurately describe one’s mood and emotions; compare with others’ response to the same object; the doctor’s emotional self-awareness is a prerequisite to optimal patient care.

Practice accepting and compassionate listening to others’ descriptions of inner states.

Reflect on relationship between mood/emotion/personality and artistic expression, and the potential role for established evidence-based therapies including journaling, art therapy, and movement therapy.

### **Day 4 Lab: Identifying and describing individuality**

Concept: today’s lab is an exercise in developing awareness of individuality. What is “an individual?” When is the concept of “individual” relevant as opposed to the patient’s demographic, gender, cultural, etc., group? Many aspects of treatment are appropriately protocol-based, such as choosing appropriate antihypertensive medication. When is the patient as an individual most relevant? Literature on individualized vs. protocol-based care has been provided.

Procedure:

- Plant observation 15 minutes; thumbnail review of the three previous steps
- Participants are asked what quality seems most essential to them or which aspect comes closest to encapsulating the individuality or essential character of that plant.
- In the classroom, condensing this conclusion into one or two words, noting it. Sharing these and discussing if a common thread arises through the multiplicity of descriptions.

- Discussing appropriate role of individualization vs. protocol for quality patient care; discuss issues of research methodology and individualization.
- Recording in lab notebooks now or after session.

#### **Day 4 Objectives:**

Define individuality.

Examine subjectivity and objectivity in relation to this level of observation and description.

Understand the role of protocol-based care and the place for individualizing care.

#### **Day 5 Lab: Medicinal Plant Effects.**

Concept: Based on the previous four days' observational processes, the group will consider medicinal properties of the plant. The group will examine methodology for determining medicinal action of plant compounds.

Procedure:

- Visit and observe the plant (10 minutes), recapitulating the four ways of observing developed in the last four days. Review the "essential" list from the previous day.
- Participants are challenged to take these qualities seriously for this exercise: if it were possible to introduce these qualities into a patient as a medicine, for what conditions might this be helpful? "findings" are compiled on the blackboard.
- Methodology: facilitated discussion of methods of observation. What conclusions and questions remain regarding qualitative and quantitative evidence?
- Each participant is assigned to use the remaining time to research a particular aspect of the medicinal plant using the library and the internet on their own devices.
- During or after this session, they prepare summary reports on their experience

#### **Day 5 Objectives:**

Determine if there are, or are not, commonalities derived from the observational and introspective method of observation used in the first four lab sessions.

Consider the implications for scientific method. Explore the validity of quantitation and observation of qualities.

#### **Day 6 Lab: Medicinal Plant Uses and its Evidence-Basis**

Concept: To compare the “evidence” gleaned from observation of the plant itself with evidence from the medical literature regarding the uses, biologic action, toxicity, and efficacy of their plant.

Procedure:

- Each participant reports on some aspect of the uses, biologic action, toxicity, and efficacy of the medicinal plant.
- Uses of the plant in modern medical care are discussed: efficacy, safety, and relevance to patient care.
- Each participant shares something they have learned from these labs, and some question they have formulated (i.e. “for future research”)
- Participants complete and submit their lab reports during and after this last session.

**Day 6 Objectives:**

Learn the uses, biology, toxicity, and clinical relevance of one medicinal plant.

Be able to discuss the evidence-basis for the usage of a plant extract or substance in patient care in a modern medical setting.

\*This course is based on the Medicinal Plant Study developed by the British study group including Margaret Colquhoun, Ian Wiggle, and Drs Michael Evans, Geoffrey Douch, Frank Mulder, and Jurgen Schurholz in the 1990’s. The course has been altered for this context but the essential framework and method are the original work of this group.