

## Frequently Asked Questions about APIB

### What is the Assessment of Preterm Infants' Behavior (APIB)?

*The Assessment of Preterm Infants' Behavior (APIB)* is a comprehensive and systematic neurobehavioral assessment of preterm and fullterm newborns developed by Heidelise Als, PhD and her colleagues.

*Als, H., Lester, B.M., Tronick, E., & Brazelton, T.B. (1982). Towards a systematic assessment of preterm infants' behavioral development. In H.E. Fitzgerald, B.M. Lester, and M.W. Yogman (Eds.), Theory and Research in Behavioral Pediatrics (pp. 35-63). New York: Plenum Press.*

*Als, H., Lester, B.M., Tronick, E., & Brazelton, T.B. (1982). Manual for the assessment of preterm infants' behavior (APIB). In H.E. Fitzgerald, B.M. Lester, and M.W. Yogman (Eds.), Theory and Research in Behavioral Pediatrics (pp. 65-132). New York: Plenum Press.*

The APIB, based on the Brazelton Newborn Behavioral Assessment Scale (NBAS, Brazelton, T. Berry, 1973. Philadelphia: JB Lippincott Co.), provides further refinement of the identification of infants' self regulatory efforts and thresholds to disorganization as viewed through aspects of the infant's behaviors referred to as subsystem interactions.

The subsystems of the infant are formally observed and considered in terms of their organization and include: autonomic, motor, state, attention, and self-regulation. Additionally, the degree of examiner facilitation necessary in order to support the infant's reorganization when disorganized is also assessed. The exam proceeds through a series of maneuvers that increase in vigor as well as tactile and vestibular demand. Further, the assessment examines the integrity of the infant's sleep organization, systematically elicited movement repertoire, and availability and quality of social interaction. The stability and organization of the infant's subsystems are continuously evaluated in their mutual interplay with each other, and in turn in their interplay with the examination's graded demands.

The APIB requires in depth training and provides in turn a highly valuable resource in support of developmental support and care provision by professionals and families.

### Who may be assessed with the APIB?

Preterm and fullterm newborns

Preterm infants, who may be brought into an examining room (e.g., parent room) and handled, typically 32 weeks post menstrual age and older are appropriate for examination. Individualized, knowledgeable judgment is required to determine the appropriateness of an APIB assessment at very early ages and/or levels of great sensitivity or significant illness. Infants, who are still too fragile or ill, may better be assessed with Newborn Individualized Developmental Care and Assessment Program (NIDCAP) observations and/or the beginnings of the APIB examination at their bedsides, without movement to a special examination room.

Well developing fullterm infants may be productively assessed with the APIB to approximately 44 weeks post menstrual age. For preterm infants and high risk full term infants the evaluation may still be appropriate for several weeks beyond that. Pairing the APIB with the Bayley Scales of Infant Development, Second Edition, is a useful option at these later ages.

### **For whom is APIB training appropriate?**

- APIB training is appropriate for clinicians and developmental professionals and consultants in the newborn intensive care, healthy newborn nursery, and follow-up clinic setting. This includes psychologists, neonatologists, neurologists, psychiatrists, developmental pediatricians, advanced degree nurse clinicians and physical, occupational, and speech/language therapists and well as infant or developmental specialists. Training and experience in formal standardized testing is a prerequisite.
- APIB training is a requirement for all those providing formal NIDCAP training (certified NIDCAP Trainers).
- APIB training is highly recommended for all developmental specialists and developmental nurse educators in charge of the implementation and facilitation of developmental care in newborn intensive and special care nurseries as well as in healthy newborn nurseries.
- APIB training is a requirement for all those, who wish to use the APIB as a research instrument.

### **What are the prerequisites prior to beginning APIB training?**

It is strongly recommended that trainees be certified in BNBAS and/or the Newborn Individualized Developmental Care and Assessment Program (NIDCAP).

### **What is involved in training?**

Prior to training, the trainee is expected to read and study the required articles from the reading list and observe APIB assessments from a certified examiner (when possible).

The first formal training typically consists of a two-day introductory session at the trainee's hospital. Special considerations may be made for trainees to schedule APIB introductory training sessions at the West Coast Training Center. Two, and in exceptional circumstances maximally three, trainees may participate in this introduction. Trainees observe the trainer examine an infant each morning and then spend the remainder of each day discussing administration and scoring details for the assessment. A timeframe and plan for working towards certification is addressed.

Trainees practice administering and scoring APIB assessments at their own hospitals, first with healthy fullterms, then with increasingly younger preterm infants, while they continue to assess healthy fullterm infants as well in order to stay aware at all times of the continuum of newborn behavior. The number of examinations and the timing of initiating examinations with preterm infants are dependent on the training, experience, background, and skill of the respective trainee.

After approximately 10 to 15 evaluations, an "APIB work session" is scheduled with the trainer. APIB work sessions consist typically of two to three day-sessions scheduled at the trainee's site. They are structured so that each trainee has his or her own day to perform the APIB assessment, with ideally one or two fellow trainees observing. The respective trainees independently score the jointly observed evaluation. The APIB trainer gives feedback regarding administration as well as scoring in a joint session with all two or three trainees present together. On the subsequent one or two days each of the other trainees examines an

infant, while the others observe. All trainees score all assessments. Typically, two and at times three work sessions are necessary before trainees achieve administrative and scoring reliability on the APIB assessment.

APIB reliability is again a two or three-day session in analogy to the work sessions described. Reliability consists in appropriate administration and accurate scoring of the APIB demonstrated with two different infants.

**How long does the training process take?**

The training process from demonstration and introductory training to certification typically requires one to two years, depending on the practice time availability of the trainee.

Initially each APIB administration and scoring requires a full eight-hour day. Eventually the administration typically requires an hour, and for a skilled examiner scoring should be achieved in under an hour.

**Where are the APIB training centers located?**

There are currently two APIB Training centers in the U.S. They are the National NIDCAP Training Center in Boston, with APIB trainer Heidelise Als, PhD, Children’s Hospital Boston, Massachusetts and the West Coast NIDCAP & APIB Training Center with APIB trainer Deborah Buehler, PhD, Mills College, Oakland, California.

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Fee structures for training costs are available from the respective training center.