

Psychosocial Risk Assessment in Clinical Medicine

Gabriel Smilkstein, MD
Tochigi Prefecture, Japan

Whether a positive or negative mental attitude can influence an individual's health has been a vexing question to physicians throughout history. Although recent studies suggest that psychosocial factors influence the natural history of many disease states and influence a wide range of physiological responses, the mechanism(s) by which the psychosocial factors contribute to the health outcome of patients with disease is largely speculative.¹

Physicians should recognize, however, that while neuroendocrinological and immune system mechanisms are still being explored, knowledge already elaborated through psychosocial research deserves clinical application. At the present time, this research is strongest in demonstrating the negative effect of psychosocial risk in patients with such problems as diabetes,^{2,3} myocardial infarction,^{4,5} asthma,⁶ and infection,^{1,7} and in the health outcome of mothers and infants in pregnancy.⁸⁻¹¹

In this issue of *The Journal of Family Practice*, Ramsey, Abell, and Baker report on a well-executed study that examines the effects of both biomedical and psychosocial risk on pregnancy outcome (low birth weight). Psychosocial risk, manifested primarily through the stress of life-change events and poor social support (family functioning and structure), accounted for a significant proportion of the total variance (16.5 percent). This finding suggests that psychosocial risk is a major contribution to the determining factors that act on the gravid woman to produce low birth weight in the newborn infant; that is, psychosocial risk does not cause low birth weight, but it plays a part in the orchestration of physiological events that lead to low birth weight.

Other investigators have also shown significant correlation between psychosocial risk (high stress and low social support) and maternal and infant outcomes at delivery such as prolonged labor,^{12,13} prematurity,¹⁴ low pediatric Apgar scores,¹⁵ maternal infection and hemorrhage,¹⁶ and postpartum complications.¹¹

After reviewing papers on psychosocial risk in pregnancy, the physician is likely to ask, "How can I use this information in routine patient care?" Research, such as that reported by Ramsey, Abell, and Baker, suggests two responses: first, psychosocial risk assessment is feasible in an office practice; and, second, many psychosocial problems identified from this assessment are amenable to intervention.

In the past obstetrical risking instruments limited psychosocial risk assessment to such problems as race and socioeconomic and marital status—problems with little or no option for intervention. When life-change events and family functioning are made the focus of assessment, however, problem areas are identified that lend themselves to therapeutics appropriate for a practice setting. Encouragement has come from Sosa et al,¹³ who have shown that practical interventions may be available. In their study the subjects in the test group were given a supportive companion when they came to the hospital in labor. The study revealed that the control group (who went through labor without a companion) had longer labor, had more cesarean sections, and demonstrated poorer bonding than the test group. This research offers an example of how psychosocial support, in this case the presence of a supportive companion during labor, may result in biomedical benefits.

It should also be noted that the techniques necessary to identify psychosocial risks are readily available through the medical interview or patient-completed questionnaire. Brief utilitarian instruments that explore life-event changes and family functioning have been developed by Sarason et al,¹⁷ Olson et al,¹⁸ Brandt and Weinert,¹⁹ Smilkstein et al,²⁰ and Norbeck and Tilden.²¹

The translation or transfer of research to the practic-

From the Department of Community and Family Medicine, Jichi Medical School, Tochigi Prefecture, Japan. Requests for reprints should be addressed to Dr. Gabriel Smilkstein, Department of Family Medicine RF-30, School of Medicine, University of Washington, Seattle, WA 98195.

ing physician requires not only that the investigators demonstrate significant findings, but that the application of the knowledge be facilitated through the use of practice-oriented schemes. Ramsey, Abell, and Baker have shown how the biopsychosocial model can be applied in research. Furthermore, their suggestions for practice application seem appropriate. It is hoped that family medicine research will continue to participate in the discoveries that are still to be made in assessing the role of psychosocial risk in clinical medicine for all health problems.

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