| Author, Year and Quality |  Group | Intervention | N Rand. | Provider | # of Sessions | Length of Sessions (hours) | Duration (months) | Estimated Hours of Contact | Detailed Description |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **CBT or Related Interventions** |
| McGregor, 2013147Fair | IG | CBT | 21 | Physician | 6 | 0.167 | 1.5 | 1 | Standard prenatal care and CBT sessions (initiated btwn 20th and 28th week gestation and occurred consecutively). First 2 sessions focused on education (antenatal depression and cognitive bx model) and bx activation. Next 3 sessions focused on education (interconnectedness btwn thoughts, feelings and bx) and cognitive restructuring; invited to complete thought records to examine negative thoughts and emotionally charged situations and apply alternative techniques. Final session reviewed previous sessions and continued implementation. Homework during first 5 sessions. Physicians given 2-hour training sessions by psychologist. |
| CG | Usual Care | 21 | NA | NA | NA | NA | NA | Standard prenatal care |
| Milgrom, 2011b149Fair | IG1 | CBT (combined) | 45 | Nurse or psychologist | 6 | NR | 1.5 | 3 | Analysis combining the two counseling groups |
| IG2 | CBT (Psychologist) | 23 | Psychologist | 6 (mean, 4) | NR | 1.5 | 3 | Six sessions of manualized Overcoming Postnatal Depression Program by an experienced psychologist a a hospital psychology department as an adjunct to GP management. All women asked to scheduled at least 3 fortnightly checkups w/ GP. |
| IG3 | CBT (Nurse) | 22 | Nurse | 6 (mean, 4.6) | NR | 1.5 | 3 | Six sessions of manualized Overcoming Postnatal Depression Program by trained nurse as an adjunct to GP management. Nurses trained in counseling-CBT intervention (assessment, goal setting, tx) by senior psychologist; sessions focused on psychoeducation, goal setting, problem solving, bx interventions, cognitive techniques; partner relationships, social support and mother-baby relationship. All women asked to scheduled at least 3 fortnightly checkups w/ GP. |
| CG | Usual Care | 23 | NA | NA | NA | NA | NA | GP management. GP received brief, focused training, consisting of face-to-face sessions (45-60 min) w/ psychologist and printed training manual (screening, dx, risk assessment and management, engagement, biopsychosocial model of post-natal depression, medication during lactation, common pt concerns, referral and principles of tx). All women asked to scheduled at least 3 fortnightly checkups w/ GP. |
| Cooper, 2003135Good | IG1 | Any treatment (combined) | 141 | Trained therapists | 10 | NR | 2.5 | 5 | Analysis of the three interventions groups combined (CBT, psychotherapy and non-directive counseling) |
| IG2 | CBT | 43 | Trained therapists | 10 | NR | 2.5 | 5 | CBT primarily directed at problems identified by the mother in the management of her infant and observed problems in the quality of the mother-infant interaction; mother provided w/ advice about managing particular infant problems, helped to solve such problems systematically, encouraged to examine patterns of thinking about infant and self, and helped through modelling and reinforcement to alter aspects of her interactional style via a supportive therapeutic relationship |
| IG3 | Non-directive counseling | 48 | Trained therapists | 10 | NR | 2.5 | 5 | Non-directive counseling; women provided w/ the opportunity to air their feelings about any current concerns and concerns they might raise about their infant |
| IG4 | Psychodynamic | 50 | Trained therapists | 10 | NR | 2.5 | 5 | Psychodynamic theory using treatment techniques to understand the mother's representation of her infant and her relationship w/ her infant by exploring aspects of the mother's own early attachment history |
| CG | Usual Care | 52 | NA | NA | NA | NA | NA | Normal care provided by GP and health visitor w/ no additional input from research team |
| Prendergast, 2001153Fair | IG | CBT | 17 | Trained early childhood nurses | 6 | 1 | 1.5 | 6 | Home-based CBT sessions by nurses who were trained by a psychiatrist, psychologist and senior psychiatry registrar in CBT method using small group tutorials, workbooks (contained psychoeducation, cognitive monitoring and thought challenging diaries and modules on anxiety management, assertiveness training, self-esteem and pleasant-event scheduling). |
| CG | Ideal standard care | 20 | Early childhood nurses | 6 | 0.33-1 | 1.5 | 4 | Weekly clinic appointments for mothercraft (e.g., changing diapers) advice and non-specific emotional support; 20-60 minutes each |
| O’Mahen, 2013160Fair | IG | CBT | 30 | Trained masters and doctoral level social workers and psychologists | 12 | 0.83 | 4 | 10 | 12 50-minute individual CBT sessions. Initial engagement session w/ motivational interviewing and 3 treatment modules (behavioral activation, cognitive restructuring, and interpersonal support) which included assessment, tailored CBT conceptualization, psychoeducation, and engagement strategies to address barriers. Behavioral activation techniques included self-monitoring, identifying depressed bx, developing goal-oriented bx, and scheduling. Interpersonal support module conceptualized interpersonal problems in functional analytic model and work to develop alternative interpersonal bx. Cognitive restructuing module focused on specific cognitions (e.g., rigid motherhood beliefs). Manual w/ materials and skills to be used as support tools. Women asked to complete either written or verbally agreed treatment exercises btwn sessions. Outreach strategy for those who missed appointments. |
| CG | Usual care | 25 | Social worker | 1 | NR | 4 | 0.25 | Provided feedback about their depression status, psychoeducational materials about perinatal depression, and local referral information about psychotherapy and case management. |
| Kozinzky, 2012145Good | IG | CBT - Related | 119 | Psychiatrists or health visitors | 4 | 3 | 1 | 12 | Four group meetings consisting of psychoeducation and psychotherapy for postpartum depression using group therapy, interpersonal psychotherapy and CBT. Patient education on pregnancy, labor and parenthood (session 1); postpartum depression screening and coping skills (session 2), recognizing distress and seeking help (session 3) and recapitulation and relaxation (session 4). Routine antepartum care (monthly visits by a trained health visitor who carries out a comprehensive health check; on five occasions, 4 times during pregnancy and once 6 weeks after delivery, gynecologist reviews pt). |
| CG | Usual Care | 205 | Psychiatrists or health visitors | 4 | NR | 1 | 4 | Four group meetings where they received routine education on pregnancy, childbirth and baby care. Routine antepartum care (monthly visits by a trained health visitor who carries out a comprehensive health check; on five occasions, 4 times during pregnancy and once 6 weeks after delivery, gynecologist reviews pt). |
| Ammerman, 2013131Fair | IG | CBT - Related | 47 | Therapists, social workers/nurse (home visits) | 16 (15 session + 1 optional booster session; mean 11.2 sessions) | 1 | 4.75 | 15 | Depression reduction using behavioral activation, identification of automatic thoughts and schemas, thought restructuring, and relapse prevention; adapted to setting, population and context and addressing the primary concerns of the mother. Treatment content focused on issues relevant to population (e.g., stress management, parenting challenges). Close collaboration w/ home visitors through written communication via web and telephone btwn therapist and home visitor w/ visitor attending the 15th session. CBT in addition to regular home visits emphasizing child health and development, nurturing mother-child relationship, maternal health and self-sufficiency, and linkage to community services following one of two models; permitted to receive depression treatment in the community. |
| CG | Standard home visiting | 46 | NA | NA | NA | NA | NA | Regular home visits by social worker or nurse emphasizing child health and development, nurturing mother-child relationship, maternal health and self-sufficiency, and linkage to community services following one of two models; permitted to receive depression treatment in the community. |
| Honey, 2002140Fair | IG | CBT - Related | 23 | Health visitors | 8 | 2 | 2 | 16 | Components: (1) educational information on post-natal depression, strategies for coping w/ difficult child-care situations and elicity social support; (2) CBT to tackle women's erroneous cognitions about motherhood and strategies for coping w/ anxiety; (3) teaching use of relaxation |
| CG | Usual Care | 22 | NA | NA | NA | NA | NA | Routine primary care by health visitors |
| Milgrom, 2005148Fair | IG1 | Any CBT (combined) | 159 | Therapists | 12 | 1.5 | 3 | 18 | All counseling interventions combined for analysis. |
| IG2 | CBT (Coping with Depression Course) | 46 | Therapists | 12 | 1.5 | 3 | 18 | Adapted Coping w/ Depression Course (Lewinsohn) and modified to fit unique needs of the mother by addition of partner sessions and modules on family of origin issue. For example, relaxation deferred in favor of earlier introduction of pleasant activities and time management; content also adapted to be less demanding in time and information processing. Components include psychoeducation, increasing pleasant events, assertiveness and self-esteem, realistic expectations of parenting, and cognitive restructuring. |
| IG3 | CBT Related - Group | 47 | Therapists | 12 | 1.5 | 3 | 18 | Counseling designed for depression and utilized supporting listening, history taking, problem clarification, goal formation, problem solving, partner sessions and group process. |
| IG4 | CBT Related - Individual | 66 | Therapists | 12 | 1.5 | 3 | 18 | Counseling designed for depression and utilized supporting listening, history taking, problem clarification, goal formation, problem solving, partner sessions and group process delivered on a one-to-one basis. |
| CG | Usual Care | 33 | NA | NA | NA | NA | NA | Case-managed by their maternal and child health nurse and referred to other agencies/services as necessary. |
| Wiklund, 2010155Fair | IG | CBT | 33 | Cognitive therapist | 21 | 1 | 1.75 | 21 | Cognitive-behavioral counseling focusing on the prevention and management of stress and low mood; functional analysis based on situation, behavior and consequences of pt's bx conducted. Pts encouraged to do home tasks (e.g., reading), daily breathing, and relaxation exercises, and thinking about positive things each week to help them accept what had happened during labor and to adapt to role as mothers. |
| CG | Debriefing session | 34 | Midwife or obstetrician | 1 | NR | NR | 0.25 | Debriefing session w/ midwife or obstetrician |
| **Other Behaviorally-based Interventions** |
| Holden, 1989139Fair | IG | Non-directive counseling | NR | Health visitors | 8 (mean, 8.8) | ≥ 0.5 | 2 | 4 | Non-directive (Rogerian) counseling talking about feelings to an empathic and non-judgmental professional (i.e., health visitor) to have a more positive view on self and life conducted by trained health visitor; infant care discussed separately. Health visitors trained in listening, encouraging clients to make judgment-based decisions rather than giving advice; each health visitor given manual describing postnatal depression and counseling; attended 3 weekly 2-hour training group sessions; videotapes used to illustrate important of counseling and role-playing. |
| CG | Usual Care | NR | NA | NA | NA | NA | NA | NR |
| Segre, 2014156Fair | IG | Non-directive counseling | 41 | Point of care provider | 8 | 0.5-0.83 | 2 | 4.5 | Listening visits either in home or OBGYN office included greeting participant, finding a private place to talked, reviewing previous visit, getting update about previous week, using key skills of reflective listening and problem solving, and summarizing to provide closure to sessions. Key therapeutic components include (a) empathetic listening to gain a full understanding of women's situation and (b) collaborative problemsolving to generate specific solutions. Also received usual home visiting or social services. |
| CG | Waitlist control | 25 | NA | NA | NA | NA | NA | Received usual social or prenatal/postpartum health care services such as linking family to appropriate health and child development services; educating clients about nutrition, newborn care, child development, and parenting; referring to community resources; providing the screening services. Participants offered intervention after 8 weeks. |
| Wickberg, 1996154Fair | IG | Non-directive counseling | 20 | Nurse | 6 | 1 | 1.5 | 6 | Counseling at home or clinic. Nurses received four half-day training sessions in non-directive counseling, approached based on assumption that talking to a non-judgmental and empathic professional will enable pt to have a more positive view of self and life; encourage pts to make decisions based on own judgment; encouraged to listening instead of giving advice; training included lectures, role-play and discussions. |
| CG | Usual Care | 21 | NA | NA | NA | NA | NA | Ordinary routine care; no scheduled checkups but possibility of visiting the clinic whenever needed |
| Goodman, 2014157Fair | IG | Perinatal dyadic psychotherapy | 21 | Nurses | 8 | 1 | 3 | 8 | Individually-tailored Perinatal Dyadic Psychotherapy eight 1-hour sessions conducted in participants’ home over 3 months by a trained nurse consisting of (a) supportive relationship-based mother-infant psychotherapeutic component, and (b) a developmentally-based infant-oriented component to enhance maternal sensitive responsiveness and promote positive mother-infant interactions. Areas of focus include (1) maternal emotional well-being, (2) infant behavior and development, (3) mother-infant relationship. First four visits were weekly, remaining four visits every other week. |
| CG | Usual Care | 21 | Study coordinator | 8 | 0.167 | 3 | 1.33 | Telephone calls from study coordinator (eight calls; first four weekly then final four every other week) over three months for about 10 minutes each; focused on monitoring depression status through administration of the EPDS and on maintaining participant engagement in the study. |
| Heh, 2003138Fair | IG | Information support | 35 | Principal investigator | 1 | NA | NA | 0.08 | Printed 3-page booklet developed by principal investigator modified from previous leaflets sent by post |
| CG | Usual Care | 35 | NA | NA | NA | NA | NA | Did not receive information booklet |
| Horowitz, 2001141Fair | IG | Interaction coaching | NR | Advanced practice nurses | 3 | 0.25 | 2.5 | 0.75 | Interaction coaching for at-risk parents and their infants (ICAP) to strengthen the early dyadic relationship. Mother-infant face-to-face interaction observed for 5 minutes; six key elements of intervention applied (1) teaching mother to identify infant's behavioral cues and tailor response to infant's preferences, (2) guiding mother to align infant in vision line, (3) demonstrate ways to modulate use of pauses, imitation, sequences, and combinations of facial expressions, voice and touch, (4) encouraging practice of suggestions and trial/error learning, (5) reinforcing sensitive responsiveness whenever it occurred, and (6) praising success. Home visits at 4-8 weeks, 10-14 weeks, and 14-18 weeks postpartum. Also received standard postpartum primary care and also could receive additional psychiatric treatment for depression as needed. |
| CG | Usual Care | NR | Advanced practice nurses | 3 | NR | 2.5 | 0.75 | Home visits at 4-8 weeks, 10-14 weeks, and 14-18 weeks postpartum; mother-infant face-to-face interaction observed for 5 minutes. Received standard postpartum primary care and also could receive additional psychiatric treatment for depression as needed. |
| **Stepped Care** |
| Gjerdingen, 2009136Fair | IG | Stepped care | 19 | Provider, care manager | NR, average 4.1 calls (range, 0-11) | NR, 20-30 min calls | 9 | 1.7 | Referral to primary care provider for initial treatment (antidepressant and/or psychotherapy referral); regular care manager telephone followup (20-30 minutes every 2 weeks); decision support for primary care providers (e.g., advice regarding specific antidepressants, additional treatment, or mental health referral); consultation or referral to a mental health specialist for complex cases (e.g., psychiatrists; therapists [psychotherapy, CBT, interpersonal therapy, other therapies]), and pt education provided through the primary physician, care manager (trained, registered nurse w/ mental health experience), and mailed postpartum depression brochure. Treatment continued until remission (PHQ-9 < 5) or pt passed the 9-month followup period. If at call or survey revealed suicide ideation, provider notified and plan of action developed. Providers given 1-hour training session and printed educational materials on postpartum depression. |
| CG | Usual Care | 20 | NA | NA | NA | NA | NA | Informed of depression diagnosis and referred to their primary care provider who managed depression according to provider's usual practice. Providers given 1-hour training session and printed educational materials on postpartum depression. |
| **Antidepressants** |
| Appleby, 1997133Fair | IG | Fluoxetine + CBT | 43 | Psychologist | 1 or 6 | 1 hour (1st session), 30 min (subse-quent sessions) | 2.75 | 1-3.5 | Fluoxetine plus one or six CBT sessions. Each CBT session offered reassurance and practical advice on four areas: feelings of not coping, lack of enjoyable activities, lack of practical support, and caring for any older children; first session lasted one hour, additional sessions lasted 30 minutes |
| CG | Placebo + CBT | 44 | Psychologist | 1 or 6 | 1 hour (1st session), 30 min (subse-quent sessions) | 2.75 | 1-3.5 | Placebo plus one or six CBT sessions. Each CBT session offered reassurance and practical advice on four areas: feelings of not coping, lack of enjoyable activities, lack of practical support, and caring for any older children; first session lasted one hour, additional sessions lasted 30 minutes |

**Abbreviations:** CBT = cognitive behavioral therapy; CG = control group; dx = diagnosis; GP = general practitioner; ICAP = Infant, Child, and Adolescent Psychiatry; IG = intervention group; min = minutes; NA = not applicable; NR = not reported; PHQ = Patient Health Questionnaire; pt(s) = participants; rand = randomized; tx = treatment; w/ = with.