Antenatal Perineal massage

Vonda Feb 2013
Aims

- Perineal trauma rates
- Effects of perineal massage
- Technique
- Research on effectiveness
- Assistive devices
Perineal trauma rates

- Over 85% of women delivering vaginally in UK sustain perineal trauma (RCOG 2004)

- 60-70% of these require suturing (RCOG 2004; Albers et al. 2005)

- Higher incidence with primiparous women

- 35% primiparous women 3/4 degree trauma on USS unrecognised at delivery (Sultan, 1993)
Implications of perineal trauma (Beckmann & Garrett, 2009)

- Pain: 42% at 10 days, 10% at 18 months
- Infection / wound breakdown
- Pelvic floor weakness
- Urinary / faecal incontinence
- Dyspareunia: 58% at 3 months, 30% at 6 months, 15% at 3 yrs
- Physical, psychological & social well being affected immediately & possibly long term
Reducing perineal trauma

- Hot compress - limited evidence / increased trauma/ pain reduction

- Delivery positioning - inconclusive evidence
  some evidence for all 4's

- Perineal massage
Antenatal perineal massage

Regular sweeping massage to the perineal body & lower vagina in the last month of pregnancy
Suggested effects
(Burns, 2009)

- Increases elasticity/flexibility of perineum
- Decreases muscular resistance to stretch - increases stretch capacity
- Reduces delivery pain & postnatal pain
- Particularly helpful for previous scarring or rigid perineum
- Helps to practice relaxing muscles used during delivery
Resultant benefits

- Reduction in episiotomies
- Reduction in 2nd & 3rd degree tears
- Reduction in instrumental deliveries
- Reduced perineal pain
Shipman et al. 1997

- Randomised single-blinded study
- 861 nulliparous women from 34 weeks
- 3-4 x week for 4 mins
- Control group PFME’s every waking hour

- 6% reduction in perineal trauma & in instrumental deliveries
- Much greater benefit in >30year olds
- Suggested less elasticity & suppleness in tissues of this age group
Labrecque 1999

Randomised single blind study

1,034 multiparous / 493 nulliparas from 34 weeks

10 minute APM daily

In Nulliparas: 60% increase in likelihood of intact perineum

In Multiparas no significant improvement
Davidson et al. 2000

Retrospective descriptive study

368 women delivering at home >37 weeks

60 primiparae / 306 multiparae

>50% reduction in likelihood of perineal trauma for primiparae

>50% reduction in likelihood of perineal trauma for multiparae with previous episiotomies (Very small sample size as tested so many variables - 13)
Beckmann & Garrett, 2006

- Cochrane review - 4 studies (1994-2005)
- 2497 women
- 9% reduction in incidence of trauma
  - 17% reduction for 1.5xwk
  - 8% reduction for 1.5-3.4xwk
  - >3.5xwk = no reduction
- 16% less likely to have an episiotomy (1.5xwk only)
- Primiparous women only
- >3.5 x week led to longer 2nd stage
Mei-dan et al 2008

- Single-blinded prospective trial
- 234 nulliparous women
- 10 mins massage daily from 34 weeks
- No significant differences
- Trial was not randomised
- Participants chose their allocation
Jones & Marsden, 2008

Literature review to determine dosage, instruction & technique

9 separate studies over 20 years (from 1986)

- Commence at 34 weeks
- Daily - 3 x week
- Each repetition 2 mins, for 4-10 mins
Application (Much variation)

Wash hands well

Lubricate thumbs & perineal tissue

Place thumbs 1 to 1.5 inches inside vagina

Press down and to the sides

With thumbs massage using “U” shaped movement

Hold position for 1-2 minutes until slight burn or tingle sensation

Perform for 10 minutes

(Incorporate with PF ex’s to focus on mm relaxation)
Women's views
Labrecque et al. 2001

1527 women from 5 hospitals
5-10 mins daily from 34 weeks

- In 1st 2 weeks - negative experience, pain, uncomfortable, unpleasant, burning sensation
- After 2 weeks - positive experience, easier & discomfort reduced/relaxing
- Helps to prepare for birth
- Useful for delivery
- Increased perineal elasticity

(Results varied greatly with compliance)
Epi-No birth trainer

Designed to gradually adapt the vagina & perineum to stretch

Significant reduction in:

- Perineal tear and episiotomy
- Reduced risk levator ani avulsion
- Reduced birth anxiety
- Analgesic requirements
- Second phase of labour

Schuchardt et al. 2000
Epi-No

- Gently & gradually pumped to maximum diameter of 10cms
- 15-20 mins then ‘pressed out’ to simulate childbirth
- Daily
Epi-No research

Episiotomy rate reduced from:

- 82% to 49% (Hillebrenner et al. 2001)
- 93.3% to 50% (Kok et al. 2004)
- 78% to 42% (Schuchhardt et al. 2000)

No reduction in tear rate
Research limitations

- Small sample size
- Mix of nulliparous & multiparous women
- Not randomised
- Only single-blinded
- Poor compliance
- High drop out rates
- Varying teaching methods
- Varying APM prescription - duration, frequency
- Predominantly caucasian population
Antenatal perineal massage

- National Childbirth Trust (NCT) advocates APM

- Midwifery Practice Guidelines by Royal College of Midwives discusses recent positive research for APM

- Some midwives & doctors recommend it
1 in 6 m/w's advise on APM, many unwilling to be trained (Gomme et al. 2003)

18 midwives asked

17 did not advocate

1 discussed only when asked
Relevance to Physio

- Many Midwives don’t teach/promote APM
- WH Physios well placed to discuss/teach
- Premkumar (2005) suggests that teaching AN PF ex’s can reduce trauma/teach muscle relaxation
- Epi-No can aid PF rehab (Dannecker, 2003)
Conclusions

- Sufficient evidence to justify APM promotion
- Possible great benefit especially for certain demographics
- Empowers mothers, positive feedback
- Nothing to lose!
- More research needed
Any Questions?
References

- Beckmann MM, Garrett AJ. Antenatal perineal massage for reducing perineal trauma. Cochrane Database of Systematic Reviews 2009


