Breech Presentation

Some Recollections and Reflections

BY

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There are few obstetricians who do not heave a sigh of relief, yet feel a sense of achievement, after completing a successful breech delivery; this is certainly my experience.

The over-all foetal mortality in breech presentation approaches 20 per cent. In the best equipped obstetrical units, the figure is almost five per cent. This presentation, therefore, is to be regarded with respect. However, one Potter of Buffalo, aimed to deliver all his cases by the breech, performing version to that presentation when necessary. The story is told that when one of his relatives was in strong labour with the head already well down in the pelvis, he would not be persuaded to allow a normal vertex delivery, but summoned an anaethetist . . . to get her deep!

Perhaps more than in any branch of medicine, obstetrics is learnt the hard way. I learnt this when doing a resident surgical job, in the provinces, in 1947. In this post, duties included being "on" for obstetrics at interval week-ends. In the early hours of the morning a primigravid breech was sent into hospital by the district midwife, as a delay in the second

stage of labour. She was a well-built young girl. The large breech was visible on the perineum. By dint of vocal encouragement and the resurgence of bearing down contractions, the breech moved. Difficulty was encountered with extended arms, but much more, with the extended, after-coming, head. The result was a moribund baby and an ugly perineal tear. This unhappy story was completed, when, five days later the perineum wound broke down. This shattering experience provided me with a resolve, not only to learn how to deliver a breech, but to learn the essentials of practical obstetrics. This was achieved a year or two later as a junior resident at the Jessop Hospital for Women.

In time, after much practice, the suturing of perineums became easy with proficient results. Basically, I learnt that this exercise entails the isolation of the apex of the tear in the vagina, the layer by layer suture of the perineal muscles and finally skin closure. Local anaesthesia is required. I have found that a continuous suture of fine, chromic or plain catgut is quick and reasonably comfortable to the patient afterwards. The correct method of suturing perineums may appear irrelevant to the subject, but the operative word in breech management is *episiotomy,* and its timing.

Consider the primigravid breech with extended legs, having reached the second stage of labour. She is placed in the lithotomy position and is encouraged to push. The breech will show at the perineum. The perineum is infiltrated with local anaesthetic solution, preferably with one per cent. strength, of the solution of choice. A pudendal block may be preferred at this stage. As the breech advances, the anterior buttock and the anus come into view. At this moment utmost co-operation with the patient is essential. She is told that her maximum effort is required. Once the painless incision in her perineum has been made, her baby will be born by her own voluntary pushing efforts. I time the episiotomy, at the stage when the posterior buttock has appeared. Then, with the next contraction, the breech descends and rises upwards. The extended legs may require the lightest of flicks to bring them down. Usually the minimum of interference is required. This lack of active interference helps to prevent the after-coming head from extending. Flexing of the head is encouraged by allowing the delivered trunk to hang passively for at least a minute, which itself always seems to be a long and tense interval. When the nape of the neck can be seen and felt, the after-coming head is well and truly in the pelvis. It can then be safely delivered by one's method of choice.

The application of Wrigley's forceps affords a slow controlled delivery; jaw flexion and shoulder traction may be preferred. I favour the Burns manoeuvre whereby traction on the extended trunk flexes and delivers the head under the sub-pubic angle. The essential points are: a timed episiotomy, minimum interference, patience, and the avoidance of force at all stages. This planned management in most instances is easy, provided one is dealing with a generous gynaecoid pelvis. Unfortunately the rare case does occur, when, in spite of the apparent safe clinical condition for breech delivery being present, there is difficulty and much consternation in deliverance of the head. I met this situation very recently. The baby was small, but the head comparatively large. The arms were fully extended. The Lovset manoeuvre delivered the arms easily; the head descended into the pelvis to such a degree that its mouth was visible and could be sucked out. The head was *just* difficult to deliver. Fortunately the overwhelming desire to use force was resisted.

The baby was limp at birth, but soon cried and gave no further cause for alarm, but one just wonders what the future mental acumen will be. Should there be any clinical doubt, an X-Ray pelvimetry performed late in pregnancy may sway one's judgment to perform an elective lower segment Caesarian Section. It is also wise in all cases of persistent breech presentation, in late pregnancy, to arrange a straight X-Ray of the mother's abdomen, to exclude any abnormality of the foetus.

Fairly recently I had to perform an emergency section for obstructed labour. The patient was expecting her second baby. Her first was a normal delivery. In this second pregnancy at about thirty-six weeks, the breech presented. An easy external version was performed. Two weeks later she went into spontaneous labour. The head which had been quite free became fixed at the onset of the second stage of labour. After one hour, the foetal heart became faint and its rhythm most variable. Lower segment Caesarean Section was performed. At operation a partially engaged hydrocephalic head was present. There was also spina bifida and a meningo-myelocoele. The baby did not survive. It is interest-

ing to observe in this mis-diagnosed case that there was little liquor amnei present.

I well remember a case of breech presentation with associated hydrocephalus, and spina bifida, which I included in my book for the membership of the Royal College of Obstetricians and Gynecologists in 1954. She was a primipara who first attended the antenatal clinic at about thirty-six weeks maturity. A straight X-Ray of her abdomen showed the abnormalities present. She went into spontaneous labour two weeks later. Labour proceeded into the second stage, when progress halted. She was then anaesthetized with intravenous pentothal. The spina bifida opening was isolated between lumbar two and lumbar three spines. A stiff rubber catheter was introduced into this opening. By using firm pressure the catheter ascended into the foramen magnum. As cerebro-spinal fluid began to flow in quantity, the foetal trunk descended. Finally, the collapsed, after-coming head entered the pelvis, and was easily delivered. The total volume of cerebro-spinal fluid measured was 21 ounces. Bilateral talipes were also present. In spite of the congenital abnormalities hydramnios was not present in this case.

A further interesting, if not traumatic, case is worth recording. She was a multipara. She was an emergency admission from the district. Attempts had been made to deliver the after-coming head, first without and secondly with a general anaesthetic. She arrived undelivered, in a state of shock. Examination under a further light anaesthetic revealed the hitherto unsuspected hydrocephalic head. Its easy delivery was effected by scissor puncture. However, of sinister significance was a tear in the lower uterine segment. At laparotomy, massive broad ligament haematomata were present which extended up the posterior abdominal wall, almost to the diaphragm. With the help of many pints of transfused blood during hysterectomy, the patient did survive.

The performance of version in breech presentation requires some thought.

In the multiparous patient, a breech presentation in the third trimester is not uncommon. Spontaneous version may occur before term. External version is usually easy to perform when this has not happened. I find performing external version in the primipara usually difficult. The presence of extended legs and little liquor amnei are probably the causes. In latter years, I have not favoured general anaesthesia for breech version.

The following cases illustrate the possible consequence of external cephalic version.

The first concerns a grande multipara in late pregnancy. Her own doctor had performed an external version in the local cottage hospital at late evening time. The version was a painful procedure. Some vaginal bleeding followed. The foetal heart disappeared and the patient became shocked. An S.O.S. was sent to the hospital in the Fen country where I was locum tenens for the obstetrician who was on holiday. The distance to travel was about 15 miles. The road was narrow, winding and bounded by dykes. It was dark and foggy. The hospital pathologist appreciated the situation and let me have four pints of stored Group O Negative blood. Fortunately, the experienced duty anaesthetist who accompanied me knew the route well. The elderly grande multipara in question was found to be pale and shocked. Her abdomen was large, tense and very tender. The foetal heart was not audible. Blood transfusion was well under way when I performed laparotomy. The uterus was intact. On opening the lower segment, the uterus was found to contain a great deal of old and fresh blood. The placenta was lying quite free within its cavity. The dead, nine pounds twelve ounce baby was delivered through the lower segment. Recovery of the mother was uneventful.

The second case concerned with version in breech presentation was in Salisbury three years ago. The patient was primipara of 22 years of age. At about thirty-four weeks the head presented. Two weeks later the presentation was a breech. A fairly easy external version was performed. The foetal heart remained good and strong. She went into spontaneous labour two weeks later. I saw her two hours after its commencement. The head was well down in the pelvis, but I could hear no foetal heart sounds. She admitted that foetal movements had not been felt at about the time labour had started. She delivered normally three hours later. The baby male was dead. The umbilical cord was thirty-three inches long. A true knot was present. My conclusion was that the spontaneous turn from a vertex to a breech, then the subsequent external version performed, created the knot in the long umbilical cord. With this history, an elective Caesarean Section should have been seriously considered before term. On a happier note, the patient became pregnant shortly afterwards, and I delivered her quite uneventfully at term. The baby boy weighed eight pounds.

I finish by mentioning two cases which occurred in 1972. The first one concerned a thirty-eight-year-old multipara. She had previously delivered normally, three boys. The last confinement was five years ago. She wished to be sterilized after this confinement. At twenty-eight weeks she had a breech presentation. Attempts at external version, made at thirty-two, thirty-four and thirty-eight weeks gestation, were not successful. At forty weeks a lower segment Caesarean Section was performed. The baby was a healthy girl weighing seven pounds, fourteen ounces. Before closing the abdomen sterilization was performed. My grounds for this management were the patient's age, the years which had elapsed since her last delivery, and the persistent breech presentation.

My second and final case, I well recall, concerned a primigravida of twenty-five years. Ten years previously she underwent cardiac surgery. As a girl she had had rheumatic fever. The operation was intended to correct a stenosed mitral valve; but in fact a patent interventricular septum was discovered and was closed. The mitral valve did not warrant surgical repair. The outcome of this operation was to improve her health enormously. Unfortunately in her first pregnancy she had a persistent breech presentation. As her heart remained functionally good, and as she had a generous, gynecoid pelvis, I was inclined to allow labour to start spontaneously and await vaginal delivery. She came into labour at forty-one weeks gestation. Although her first stage lasted over twenty-four hours, she delivered with the minimum of assistance after twenty minutes in the second stage. The baby girl weighed seven pounds, four ounces. The patient's heart stood up perfectly to the stress of this labour.

Obstetrics has benefited from the application of scientific knowledge over the past twenty years and will continue to do so, with obvious advantages to mankind. More recently, the closer monitoring of the foetus, in labour, with scalp blood sampling, and the use of cardiotochograph would be of particular value, in the management of breech delivery. I find difficulty in understanding and assimilating the wealth and volume of recently published work and research on obstetrics. It is hoped that this short paper of simple clinical experience will be of interest and possibly of value to the obstetrician who may be practising out of reach of sophisticated centre; he will eventually be faced with breech presentation.