CHAPTER 7

Contraception

Humans have been using contraception almost since they discovered the link between intercourse and reproduction. There have always been two choices - physical methods aimed at preventing sperm and ovum meeting, and chemical methods aimed at preventing sperm or ovum forming or making them incapable of fertilisation.

Probably the oldest method was withdrawal, or 'being careful' as it used to be called. The biggest drawback of this method is not its lack of reliability (its failure rate, at 4-18 percent, is less than that for spermicides and about the same as the diaphragm or cervical cap), but the fact that it can be extremely frustrating and embarrassingly messy. The worst of it is that it virtually precludes the possibility of simultaneous orgasm (it actually lessens the likelihood of female orgasm) and its concomitant close unity that, to many couples, is the very essence of sex. Not only does this diminish sexual satisfaction but it also promotes social distance between male and female.

Because of its inadequacies, other means were sought. Throughout the ancient world, many herbs were discovered which were quite effective contraceptives (one, a species of giant fennel that grew near Cyrene in what is now Libya, was apparently so good it was harvested to extinction) or, more usually, abortion-inducing. These latter remedies were largely concocted and distributed by 'old wives' and (later) midwives. Unfortunately, while effective, many of them were quite dangerous to the health of the woman.

Partly because of this and partly because of the 'turf war' that developed between doctors and midwives, their use came to be more and more proscribed. Then the Church, with its pro-natalist dogmas, stepped in, proclaimed contraception and abortion as sin and triggered witch hunts for women dispensing these potions. Not surprisingly, their use virtually ceased - helped by the plagues which swept many parts of the world and made population replenishment desirable.

In the atmosphere of general ignorance of the Middle Ages, their place was taken by such bizarre and ineffective practices as jumping backwards ten times or drinking a bottle of gin (sometimes containing raisins) while taking a hot bath. Before we scoff too loudly, it is worth noting that douching with Coke is one of the less weird methods still advocated today in folk lore.

What part such ignorance plays in the fact that more than half of all pregnancies in the US are unintended remains - despite its obvious importance - to be elucidated. A sexually active female not using contraception has about an 85 percent chance of becoming pregnant within a year. Only about three percent of unintended pregnancies are due to failure of contraceptive method in the sixty percent or so of women aged 15 to 44 using contraception in the US.

With effective female chemical methods more or less banned in the Middle Ages, attention focused on barrier methods - initially the male-actuated condom and then, probably because males can't always be trusted, the diaphragm and cervical cap.

If you or your partner sleep around, have anal sex or share needles, the only method of birth control is the condom. French letters (or English letters, as they are known in France) are very effective in preventing both sexually transmitted diseases (including AIDS - especially spermicidal latex types; and, through preventing transmission of the genital wart virus, cervical cancer) and pregnancy. Their other big advantage is that you can get them at numerous retail outlets and vending machines. Most failures (2-12 percent overall) are due to incorrect use, but the 'supersensitive' types are more likely to burst or tear and still feel like taking a shower in a raincoat; so forget them. They can cause allergy problems in some users.

If you can't make condoms work or are really paranoid about pregnancy or getting one of the sexually transmitted nasties, you can use a spermicide with a frenchie and increase your chances of preventing both to nearly 100 percent. You could try a spermicide on its own but, while it could be just as effective as a condom (though not in preventing AIDS and other nasties), this depends even more so on careful use (actual failure rates are around 21 percent), and more

than half of couples get sick of the mess and the messing about within a year. Many women also get itches and urinary tract infections.

The same probably applies even more so to the diaphragm and the cervical cap. They are almost always used together with a spermicide, so you have those hassles as well as the bother of getting the things fitted (and checked for size every six months and refitted after pregnancy or after significant weight loss or gain), inserting them and looking after them. There is also an increased risk of urinary tract infections, and allergy prevents some women using them. Actually, they're not a hell of a lot more effective than a spermicide used on its own. Causes of failure (overall rate 6-18 percent) include improper fit, displacement during sex, time-related loss of spermicidal potency, and mechanical defects. If you're under 30 and/or make love more than four times a week, forget it - your chances of becoming pregnant within a year virtually double. There is a similar device called the contraceptive sponge, with similar failure rates to the diaphragm and cervical cap in women who have not had a child, but with 9-28 percent failure rate in women who have had a child. It does have the advantages that it is easy to use because spermicide is contained in the sponge and doesn't have to applied; it is available without a prescription; and it may be inserted up to 24 hours before intercourse. On the other hand, it may be hard to remove and can irritate the vaginal lining.

All of these devices are (rarely) associated with the potentially fatal side effect of toxic shock syndrome.

The latest attempt to shift the focus to women is the 'female condom', launched in 1991. It is less effective than the male condom in preventing both pregnancy and sexually transmitted disease, but may be an option for women who can't persuade a partner to use the male version.

Meantime, in 1951, Margaret Sanger, founder of the Planned Parenthood Federation of America, persuaded philanthropist Katharine McCormick to finance George Pincus, a fertility investigator at the Worcester Foundation for Experimental Biology in Massachusetts, to develop and test a new contraceptive drug based on the known fact that progesterone, a hormone released during pregnancy, can turn the female reproductive system on and off. So was born The Pill - widely credited with producing a sexual revolution.

In Australia, The Pill was largely responsible for the halving of the fertility rate from a peak of 3.6 in 1961 to the current 1.8 and is still, at 40 percent, easily the most widely used method. If you're a woman in a steady one-on-one relationship with a non-druggie, smoke fewer than 25 cigarettes a day and have no personal or family history of blood clots, The Pill is probably still the shot. If you remember to take it on the regular daily schedule, your chances of becoming pregnant are almost non-existent (the actual failure rate is about 0.1-3 percent). It might even lighten and shorten your periods and reduce or eliminate your menstrual cramps and may relieve premenstrual tension. On the other hand, it could make you feel like a whale with a bad case of morning sickness and aching tits - at least for the first cycle or two. If you're at all prone to blood clots, forget it; you could get strokes, heart attacks or serious leg problems - especially if you are a smoker or over 35. There is also a risk of The Pill worsening high blood pressure, sickle cell disease, gallbladder disease, vascular complications of diabetes, jaundice, and monilial vaginitis. The varieties containing oestrogen give some protection against cancer of the breasts, womb and ovaries, and decrease the risk of pelvic inflammatory disease, fibrocystic breast disease and benign ovarian cysts. However, they can also turn you off sex and maybe give you migraines, as well as being linked to an increased risk of cervical cancer and benign liver tumours. Taking certain antibiotics and other prescription drugs may diminish The Pill's effectiveness and you should always check on this when your doctor prescribes another drug and, if necessary, use another method while you are on that drug. About three-quarters of women who try The Pill find it works fine for them.

If you can't remember to take The Pill, there is Depo-Provera, a synthetic form of the hormone, progesterone, which you get by injection every two or three months. It is as effective as The Pill but is more likely to cause irregular menstrual bleeding, breast tenderness, weight gain

and depression.

Then there is Norplant, in which six flexible capsules, each about the size of a paper match, are placed just under the skin of a woman's upper arm. For five years, the capsules slowly and steadily release a hormone that prevents pregnancy. The failure rate for this period is the lowest for any method, at about 0.2 percent. After five years, they must be removed through a small incision. Unfortunately, this can take up to two hours if fibrous tissue has formed around the capsules. Why this has happened much more often in some trials than in others isn't clear but it probably accounts for the fact that anywhere from a quarter to three-quarters of women have lined up for a second go. As well as these dropouts, about ten percent quit during the first year because of irregular menstrual bleeding, headaches, acne and breast discharge.

Implanon, a single capsule hormone implant that lasts three years and has had a 100 percent success rate in trials, has recently hit the market in Europe.

A hormone patch for women is also being developed in the US but it could be some ten years before it is widely available.

In India, a once-a-week pill, that works by blocking the effects of oestrogen, is also being used but every year about 13 percent of women using it get pregnant.

There is also the morning-after pill. This is actually several pills or an injection of a high dose of oestrogen, with or without progesterone. Unlike other birth control methods, it does not aim to stop fertilisation but the next stage, the implantation of the blstocyst formed from the fertilised ovum in the uterus. It is 98-99 percent successful in preventing pregnancy but often causes nausea and breast tenderness and is not intended as a routine method but rather for use in an emergency situation such as after rape, condom breakage or some other obvious failure in contraceptive method.

What about a Pill for men? An international survey has found that about two-thirds of men would take a male oral contraceptive pill, though this figure was down to 44 percent in Hong Kong. In another survey, only two percent of women said they would not trust their partner to take it. It is hoped that a male hormonal contraceptive will be on the market within five or ten years. The male pill works much like the female Pill. It comprises testosterone and progestin, which together suppress the production of follicle stimulating hormone and luteinising hormone. This interrupts the production of sperm in the testicles and is as effective as the female Pill and certainly more reliable than condoms. However, it does not stop sperm already in production (this takes 60-72 days) or destroy those already produced and it takes four to six months for sperm counts to return to normal after stopping taking it.

Other approaches being worked on are a product to stop sperm moving, so they can't get to the egg, and a capsule, to be implanted in the scrotum, which will generate a minute, but sperm-killing, current.

Vaccines against the hormone which starts the sperm production process and against a hormone that prepares the body for pregnancy should be commercially available in some three to six years. With these, you'll probably have three injections six weeks apart and then an injection every year you don't want babies.

Partly because of problems with early formulations of The Pill, a different approach to contraception was developed in the 60s. The IUD (intra-uterine device) works, not by preventing fertilisation, but by stopping implantation of the fertilised ovum. It is very widely used because it is very effective (0.8-3 percent failure rate) and, once in, can be more or less forgotten about for up to eight years. Most women find it great at first but only about a third manage to use it beyond three years. This is partly because bacteria love IUDs and some of these bugs can cause life-threatening infections and infertility, and partly because some users have continuing pain and/or crippling cramping and heavy bleeding during periods. With IUDs, it needs to be remembered that, far from providing the protection from sexually transmitted diseases that condoms do, they actually increase the chance of these diseases causing pelvic inflammatory disease. They are, therefore, really only suitable if both partners are monogamous homebodies. They must be

inserted by a doctor, checked yearly and replaced when necessary. Other problems are that they can cause perforation of the uterine wall and that they can be expelled during menstruation. If pregnancy should occur, there is a dramatically increased risk of miscarriage or ectopic pregnancy (development of the fertilised egg within a Fallopian tube) - both of which can be life-threatening.

In the US, the most popular method of contraception overall is sterilisation, with over twice as many females having their Fallopian tubes tied (actually, usually severed) as males having their vas deferens snipped. Both operations are safe, simple and sure methods of ensuring you don't have any (more) kids ever.

Getting the tubes tied is much the riskier way to go. Burns, punctured womb or intestine, internal bleeding, infection and heart block from the anaesthetic can all happen, and some women have such painful and heavy periods they need to have their wombs scraped or removed. The failure rate is also about double that for male sterilisation, at 0.2-0.4 percent. The operation can be reversed, but the surgery is expensive and technically complicated and is successful in from forty to eighty percent of cases, depending largely on how much of the Fallopian tubes was left for reconstruction. So, why was the procedure developed so much earlier than the male version and why is it still used twice as often today? Firstly, because it (and the more radical procedure of hysterectomy, where the womb is removed) can be disguised as being for curative purposes and not just for contraception, and because of the male fear of loss of virility (Freud's 'castration complex' undoubtedly does have some small degree of truth).

Vasectomy was developed in response to the perceived urgent need for population control in some countries, especially India. It is much the simpler operation. Now you don't even need an incision, just a tiny puncture. You'll have sore balls for a few days but, after that, no effect on your desire or performance. Failure rate is 0.1-0.15%. There was a suggestion that vasectomy could cause prostate cancer some twenty years later but recent studies have shown that this is probably untrue. There is a fifty fifty chance of reversing the procedure if you change your mind, but the surgery is costly and complicated.

If none of these methods is for you, you can try so-called 'natural family planning', otherwise known as 'papal roulette'. These methods were developed to attempt to provide Catholic couples with a means of contraception not involving active interference with the process. They are based on various means of determining the time of ovulation and avoiding intercourse for a suitable period around this time. For some couples, failure rates are very low (about one percent for perfect use of the postovulation method), but these are couples where the woman's periods are as regular as clockwork, she has done a lot of measuring and recording, and neither of them minds missing out a good bit of the time. For others, the chances of pregnancy are about 20 percent.

To sum up, despite masses of research in recent decades , at the moment we're still stuck with the condom for casual sex, The Pill for those in regular relationships who can use it, vasectomy for those who want a permanent solution, and a number of not very satisfactory alternatives for the others. However, most couples manage to find a method they can live with and there are some promising advances in the wings.