

## ANNEX A [1]

### **STANDARDS of CARE GUIDELINES for GPs on the TREATMENT of GENDER DYSPHORIA/TRANSSEXUALISM**

Gender dysphoric and trans people may present for treatment for their gender dysphoric condition, and also for totally unrelated conditions. Whatever their needs, they must be addressed and accommodated according to their core gender identity, unless they specify otherwise. If medical and/or administrative staff are unsure of how to address an individual, Mr, Miss, Ms, Mrs, it is better to ask. The terms trans woman (male to female individual) and trans man (female to male individual) are used, in accordance with the preference of the trans communities.

The diagnosis of Gender Dysphoria may be made by the GP, together with the patient concerned, when he or she expresses some level of inconsistency between the psychological identification as male or female, and the phenotype. This diagnosis may be confirmed, again, in conjunction with the patient, by a specialist Psychiatrist, to whom the GP may make a referral. This specialist may indicate that co-existing conditions or illnesses may need prior, or parallel, treatment. Many individuals will describe having been aware of symptoms of discomfort with their assigned gender, starting in childhood and becoming progressively more intrusive. Generally speaking, where the inconsistency between phenotype and gender identification has resulted in a profound and persistent discomfort, over a period of approximately two years or more, the individual may be diagnosed as experiencing transsexualism, so there may be a medical need to transition to the opposite phenotype and gender role from that in which the individual has lived up to this point. Throughout, treatment should be flexible and patient led, as far as is consistent with clinical safety. The practitioner should take full account of the individual's view of his or her needs and also his or her view on the scheduling of treatment. Many social, employment and family pressures create dilemmas which can influence and change the treatment and its scheduling, before a final course of action is determined. Different levels of medical intervention: psychotherapeutic, hormonal and surgical, may be appropriate for different personal experiences of gender dysphoria. Surgery may involve realignment of genitalia, gonads and secondary sexual characteristics to accord, as closely as possible, with the gender identity experienced by the individual. Many individuals have struggled with their condition for many years before seeking treatment and may be feeling quite desperate. They and their families are in need of a great deal of support and understanding. Some may even have self-administered hormones or hormone blockers, available from other sources, e.g., the internet. The GP will need to take account of this when treating individuals, or referring them for treatment elsewhere.

[children/adolescents should be referred to a specialist clinic. n.b. symptoms in younger patients do not always translate into transsexualism in an adult. See Annexes (5)& (6)]

For the treatment of adult gender dysphoria/transsexualism, the following protocol is appropriate:

It is important that the GP is able to build a rapport with the patient. If the GP feels unable to support a patient requiring treatment for gender dysphoria, prompt referral to a more empathetic local GP should be made. The GP and patient should discuss together:

- The patient's history of, and present experience of, gender status discomfort
- The possibility, if the individual wishes it, for family members to be included in support of the individual and, also, to help the family understand the condition. relevant literature (e.g. GIRES leaflet) is available for family members.
- The possible care pathway as seen by the patient as well as the GP.
- The GP should take a full patient medical history, especially: any venous-thrombo-embolic disease; family history will be relevant – thrombophilic screening may be considered.
- The GP may identify possible providers of care, in addition to GP care and refer to a specialist care provider, i.e. Gender Identity Clinic, either directly or via a local specialist psychiatric source.

- The GP should note that it is important, where the referral is to a local psychiatrist, that this practitioner has some experience in the field of gender dysphoria/transsexualism. The first appointment should be achieved within three months of referral from the GP. (less if possible)
- The GP may initiate other treatments such as facial hair removal and speech therapy for trans women. Referral for rhinoplasty (nose remodelling) and thyroid chondroplasty (tracheal shave) and, occasionally breast augmentation may also be sought (nb. a specialist surgeon is advisable as the sternum may be more prominent than in other women); and, for trans men patients, referral for double mastectomy may be appropriate. (Guide available for FtM London in conjunction with Mr Dai Davies, Consultant Surgeon. [Info@ftmlondon.org.uk](mailto:Info@ftmlondon.org.uk)) Any additional local care, possibly involving specialist nursing, social services, local liaison psychiatric support. Where the latter is required, it is especially important that the psychiatrist (or psychologist) is able to build a rapport with the patient. Where this is not the case, an alternative practitioner should be commissioned.
- The GP is likely to be the source of on-going administration of hormones (see below), although the initial prescription and dosage may have emanated from a specialist Endocrinologist or a specialist Psychiatrist, both of whom may be independent or part of a Gender Identity Clinic team.
- The GP should also liaise with the Gender Identity Clinic or independent clinician responsible for the initial prescription, once treatment has started, to ensure continuity of treatment and that no unnecessary, non-clinical delay occurs during the course of treatment leading to surgery (where that is sought).
- Explore with the patient the various options available for preserving reproductive capacity (such as gamete storage) and explain the effect of hormone therapy and surgery on fertility
- Provide specific information about local, private or NHS facilities suitable for storage of gametes and encourage the patient to think about whether they might wish to have a family in due course. This is especially important in younger people who may not have considered having a family thus far
- It is inappropriate and may be considered misconduct for the psychiatrist to assume that a patient who opts for gamete storage, or has already done so, is in any way equivocal about, or not committed to, the transition process.
- The GP should, where requested, provide a letter confirming that the individual is undergoing transitional treatment for transsexualism, for the purposes of changing documentation, e.g., obtaining a new record of name and gender from the Registrar General, passports and driving licences, and authorising the use of appropriate changing and toilet facilities. Where an employer is unaware of the patients situation, certificates for time off work may need to be carefully worded so as not to breach confidentiality.
- If the patient transfers to another Primary Care Trust, the GP should take responsibility for liaising with that Trust, in order to ensure smooth transfer and continuity of funding and treatment.
- Post-surgery, the GP may need to co-ordinate support care services, such as a District Nurse, home-help etc. See Annex B (6) (7) (8a) (Annex B may be used in conjunction with NHS consent forms.
- for additional information about post surgical complications.
- Prostate glands will shrink with hormone treatment but, as a precautionary measure for those who transition later in life, PSA level checks for prostate abnormalities may be undertaken.
- the GP must be aware that, where full surgical transition is not possible or appropriate, on-going psychological support systems and hormonal treatment should be available.

### **Specific Monitoring and Treatment Protocol for Adult Trans Women**

- Increased morbidity has been described, in trans patients who are being treated with hormone therapy. This particularly applies to trans women patients. An increased risk of thromboembolism has also been described, which may be related to raised prolactin levels. However, this may have been the result of excessive dosage in the level of hormones used, particularly

oestrogens. Modern therapy can effectively inhibit the secretion of the undesired gonadal hormone rapidly. With the use of exogenous dosage of oestradiol, rather than equine oestrogens which cannot be measured in blood nor, therefore, monitored, the oestrogen levels can be kept within the normal female physiological range. Hopefully, therefore, the increased risk should not occur.

The following notes are guidelines which may need to be adapted to suit the individual patient.  
n.b. where the GP is not the prescribing clinician, he or she should obtain written hormone treatment and monitoring protocols from the prescribing clinician for the individual patient.

#### **Before hormone treatment commences:**

- General examination to include: full medical history, and family medical history, physical examination
- Blood pressure, urine, weight, height; calculation of body mass index (BMI)
- Where the patient is over 45 and/or there are relevant symptoms, check for pelvic malignancies prostate or other genital abnormalities:

#### **Recommended laboratory tests for baseline levels:**

- Serum testosterone, sex-hormone binding globulin, oestradiol, LH & FSH, prolactin, free-thyroxine TSH liver function tests (LFT), urea and electrolytes, FBC, fasting cholesterol and triglycerides.
- All the implications of embarking on hormone treatments must be discussed in full, including potential, unwanted side effects and any irreversible effects. The GP should ensure that this discussion has taken place either between him/herself and the patient, or between any other relevant clinician and the patient. An INFORMED CONSENT FORM (Annex B[1][2] may be used in conjunction with NHS consent forms) must have been made available to the patient at least 4 weeks prior to the commencement of treatment; it must be discussed and signed by the GP or other clinician and the patient. The information must be presented in such a way that the patient has the capacity to comprehend it, and to make a decision based on it. At present no individual can give or withhold consent to treatment on behalf of another person (unless mental health legislation applies). If the GP has not been a party to the completion of the form, he/she should have sight of it and should discuss its contents with the patient. Methods of hormone delivery include: oral, injectable and transdermal systems.
- Prior to commencing treatment, patients should also be advised that smoking is contra-indicated, especially where surgery is eventually anticipated. The combination of excessive alcohol and hormone treatment can be dangerous. Alcohol should be limited to 14 units a week at most. Obesity is also an added health risk.
- Trans women treated with oestrogens can expect: breast growth, some redistribution of body fat, decreased upper body strength, softening of the skin, decrease in body hair, slowing or stopping the loss of scalp hair, decreased fertility and testicular size, less frequent, less firm erections and decreased libido
- Most of these changes are reversible although breast enlargement may not be entirely so, except through surgical intervention.
- Patients should be advised that cessation of hormones for a few weeks (prior to surgery) will cause beard growth to return, especially where hair-removal treatments are incomplete.
- Advise that the effect of hormones on the breasts will be to make them lumpy and tender for a while. Teach the patient how to examine her own breasts as they develop

**Hormone Treatment of Trans Women (Mimms and BNF should be consulted for additional information regarding contra-indications of specific medications)**

Hormones are usually prescribed by Endocrinologist or specialist Psychiatrist, either practising independently or as part of a Gender Identity Clinic team, where treatment protocols have been agreed with the team's Endocrinologist. However, hormones may be prescribed by a specialist GP or other doctor specialising in the field, in accordance with a regimen agreed by a specialist Endocrinologist. As stated above, the following protocol is a suggested guide, and should not be followed rigidly, but tailored to the individual's need.

- It has been conventional to try to inhibit male hormone action using the antiandrogen Cyproterone Acetate (CPA), using a dose of 100mg daily (perhaps delivered in two doses) While this is effective, it can cause liver abnormalities and depression. A safer and more effective alternative is to use a depot injection of an analogue of the gonadotrophin releasing hormone such as Goserelin. This is usually started as a 3mg subcutaneous pellet injected every four weeks or a larger dose can be given three monthly by subcutaneous injections. This inhibits secretion of the pituitary gonadotrophins and testosterone secretion producing a “ chemical castration”. This therapy is without side-effects as long as hormone replacement with oestrogens is given. Dianette (low dose cyproterone and E2) may also be used as it is less hepatotoxic than high dose CPA and may be used with oestrogen/progesterone combinations Low dose Finasteride, which blocks conversion of androgens to the more active testosterone, may also be given to discourage male-pattern hair loss.
- Oestrogen is best administered as oestradiol, which is the physiological oestrogen, which can be monitored in blood. Other oestrogen formulations, such as ethinyl oestradiol, or equine oestrogens (e.g. Premarin) are not physiological human hormones and cannot be measured in the blood nor related to normal physiological level.
- The starting dose of oestradiol is 2 mg daily. Alternatively for trans women over 40 years old, transdermal patches may be recommended as they may lessen the risk of deep vein thrombosis (dosage of between 50 and 150mcg used two to three times per week with measurements of oestradiol level at 24 or 48 hours after application, aiming to achieve a level at between 400 and 600pmol/l). This dosage will be combined with Goserelin or Cyproterone Acetate.

**Monitoring Ongoing Hormone Treatment of Trans Women**

- general and emotional health
- After 2 to 3 weeks serum oestradiol levels should be monitored and a standard time point after the tablet is solid, e.g. at 24 hours after the tablet is taken, or 48 hours after the application of a patch. At this time circulating oestradiol levels of between 600 and 800 pmol. per litre should be the aim, i.e. high follicular phase levels. Dosage of oestradiols should then be increased or decreased to achieve this therapeutically desirable range.
- Circulating LH, FSH and oestradiol levels to be monitored as indicated above until an effective, therapeutic regimen is established.
- Thereafter, fasting glucose, circulating lipids, liver function tests, haemoglobin and prolactin should be measured six monthly for one year, and then yearly.
- Serum prolactin monitoring may cease after three years if it remains in the normal range.
- During and following this period, blood pressure and weight should be checked at 3, 6 and 12 months and yearly thereafter.
- Check legs for any signs of Deep Vein Thrombosis (DVT)
- The surgeon may require the patient to cease hormone treatment for up to 6 weeks prior to surgery. Patients should be made aware that this may be a distressing period during which they experience mood swings

### **Hormone Treatment & Monitoring Post-Surgery for Trans Women**

- From 4 weeks post-operatively resume oestradiol (or other oestrogen treatment) in low doses, building to 2mg daily (plus antiandrogens, short-term only, if necessary to support on-going hair removal treatment)
- Dose regimens need to be monitored once again, as above, to ensure that the dose requirements remain the same. It is wise to undertake DEXA bone scans to be sure that bone density remains normal on the oestrogen replacement therapy in the orchidectomised patient, yearly for six years, then from time to time depending on the age of the patient.
- Check BP, weight, urinalysis, oestradiol and cholesterol and prolactin levels at 1, 2 and 3 years post-operatively, then, cease, if test results are stable and no hyperprolactaemia occurs.
- In line with other women having oestrogen treatment, trans women should be monitored for breast cancer, when they are over 50 and have a family history of the condition.
- Note that a height reduction could indicate osteoporosis.

### **Surgery**

- GPs should be aware that surgery may include orchidectomy, penectomy, vaginoplasty, clitoroplasty and labiaplasty. The most usual technique involves penile skin inversion. Sexual sensation is an important objective in vaginoplasty and clitoroplasty, along with the creation of a functional vagina.
- See Annex B (6) (7) (8a) (may be used in conjunction with NHS consent forms) for additional information regarding post surgical complications.

### **Specific Monitoring & Treatment Protocol for Adult Trans Men**

#### **Before treatment commences, general examination to include:**

- Patient's full medical history and any relevant family medical history. Ultrasound scan of pelvis will be adequate for those who have not been sexually active. Cervical cytology should be done for those who have been sexually active, unless they have had two 'normal' smears during the past three year period. If an internal vaginal examination and smear test is deemed necessary, the patient should have a full explanation of the reasons for this. Medical practitioners should be aware that trans men may feel particularly sensitive to this examination and may refuse it. This refusal must not prejudice ongoing treatment. It is the duty of the GP [or other specialist] to be sure that the patient has had a full and adequate explanation of any adverse implications of this refusal. (See Annex B[8b]) for suggested Informed Refusal form.
- BP, weight, height, calculation of BMI, urinalysis
- Regular examination of breasts should continue where the family history indicates a predisposition to developing breast cancer.
- Laboratory tests:
  - FBC, renal and liver, bone (calcium & phosphate), free thyroxin TSH, fasting cholesterol, triglycerides and glucose, LH, FSH, oestradiol, testosterone and prolactin.
- Scan for detection of ovarian cysts and fibroids
- All the implications of hormone treatments must be discussed in full, including potential, unwanted side-effects, such as cardio-vascular disease (any family history of CV disease or diabetes is relevant) and any irreversible effects, such as deepening of the voice and growth of facial hair. The GP should ensure that this discussion has taken place either between him/herself and the patient, or between any other relevant clinician and the patient. An INFORMED CONSENT FORM (Annex B[3] may be used in conjunction with NHS consent forms) must have been discussed and signed by the GP or other clinician and the patient. If the GP has not been a party to its completion, he/she should have sight of the form and should discuss its contents with the patient. The information must be presented in such a way that the patient has the capacity to

comprehend it, and to make a decision based on it. At present no individual can give or withhold consent to treatment on behalf of another person (unless mental health legislation applies).

- Individuals should be warned of the increased risk if they smoke, drink alcohol in excess of 14 units a week or are significantly overweight. The GP should offer relevant advice where these factors are present.
- The patient should be advised that menstruation will cease between 3 and 6 months after the commencement of treatment; by three months, the voice will have deepened and beard growth will be starting. Between 9 months and 12 months, male-pattern facial hair will become established.
- The patient should be advised that once treatment commences, the breasts should be checked regularly especially prior to mastectomy and in the over 50s; any abnormal vaginal bleeding should be reported

**Hormone Treatment for Trans Men** (Mimms and BNF should be consulted for additional information regarding contra-indications of specific medications)

Hormones are usually prescribed by Endocrinologist or specialist Psychiatrist at a Gender Identity Clinic, where treatment protocols have been agreed with the team's Endocrinologist, but may be prescribed by a specialist GP or other doctor who specialises in the field, in accordance with the protocol agreed by a specialist Endocrinologist. The following protocol is a suggested guide, and should not be followed rigidly, but tailored to the individual's need.

- If an internal vaginal examination/cytology has not been performed at an earlier stage, and is still deemed advisable, there is now a further opportunity for the GP to raise the issue again, giving the patient a full explanation of the reasons. As stated above, medical practitioners should be aware that trans men may feel particularly sensitive to this examination and may refuse it. This refusal must not prejudice their ongoing treatment. It is the duty of the GP (or other specialist) to be sure that the patient has had a full and adequate explanation of any adverse implications of this refusal. A form indicating Informed Refusal should be signed by patient and practitioner (Annex B[8b])
- Goserelin depot injections, or alternative similar preparation, should be started together with a depot testosterone injection such as testosterone enanthate of 250 mg intramuscularly each two weeks. After 2 such injections voice changes are largely irreversible except by surgical intervention, (see Annex A[4]) An alternative to an injection of testosterone is the use of oral testosterone Undecanoate which unlike other oral testosterone preparations does not have hepatotoxic effects. Usual doses will be 120-160 mg daily.

**Monitoring of Hormone Treatment of Trans Men**

- After 2 to 3 injections, serum testosterone levels should be measured, just before an injection is due. A level just above or just below the lower end of the normal male range of serum testosterone is the desirable level at the time of the next injection. Levels at this point, at or above the middle of the normal male range, will lead to accumulation of excessive levels of testosterone in the ten days after an injection, which is likely to have an adverse effect on the arterial system and on haemoglobin.
- If oral testosterone undecanoate is prescribed, this cannot effectively be monitored using serum testosterone levels because it is preferentially converted in the gut wall to a more active metabolite, dihydrotestosterone. Effective replacement of this preparation would be reflected by a serum dihydrotestosterone level, twice the upper limit of normal, but a subnormal serum testosterone level, in a blood sample obtained 3 – 4 hours after a morning dose. Serum testosterone may remain subnormal.

**Monitoring of Goserelin Dose in Trans Men**

- Serum LH and FSH levels should be obtained, 2 – 3 weeks after Goserelin is given, to demonstrate full suppression of pituitary gonadotrophin levels. This is best done after the second and/or third injection.

**Also During the First year at three months, six months and twelve months( and thereafter yearly)**

- assess patient’s psychological and physical wellbeing
- BP, weight and urine tests, legs should be checked for peripheral oedema
- Check breasts where age and/or family history indicate raised risk
- Renal, liver, fasting cholesterol, and triglycerides prolactin levels, LH and FSH, oestradiol, testosterone (and dihydrotestosterone if appropriate) as indicated above, to ensure that an adequate dosage regimen is established

**Post-oophorectomy and Hysterectomy**

- Androgen (testosterone) treatment may be resumed from 4 weeks post-operatively
- Warn that alcohol intake should be limited to 21 units per week,
- Assess the patient’s psychological and physical condition
- BP, weight, check legs for oedema
- Check renal, liver, fasting cholesterol, and prolactin levels, triglycerides, LH and FSH, oestradiol, testosterone (and dihydrotestosterone if appropriate) at 3 months, as indicated above, to ensure that an adequate dosage regimen is re-established. Ongoing blood tests should no longer be necessary unless risk factors exist. Androgen treatment will continue unless contra-indicated. Regular examinations for breast cancer should continue, even after mastectomy, depending on age and family history.

**Ongoing Possible Surgical Procedures – Phalloplasty**

GPs should have an overall understanding of the possible procedures. Not all trans/men seek phalloplasty, but if they do, the implications should be discussed in full and properly informed consent given, as with all other procedures. This will be done with the surgeon.

- The GP may need to refer the individual for electrolysis or for laser treatment, in order to remove hair from the donor site.
- the individual needs to understand that phalloplasty involves several surgical procedures over a period of time.
- The GP should be aware, broadly speaking, of the possible alternative levels of surgery available. Procedures may include: metoidoplasty (creation of micro penis), scrotoplasty, urethroplasty (penis through which urine may be excreted), placement of testicular prosthesis, and phalloplasty, a full sized penis and/or a penis which can be made erect.

**Post – surgery**

- The individual will require the same care as any other patient following major surgery with particular attention to the donor-site care. District & Practice nurses may be involved if the patient returns home with a catheter in situ.

## **[A2] STANDARDS OF CARE FOR PSYCHIATRIST OR OTHER MENTAL HEALTH PROFESSIONALS [GENDER IDENTITY CLINIC] TREATING GENDER DYSPHORIA/TRANSSEXUALISM**

Trans men and trans women should be addressed and accommodated according to their core gender identity unless they specify otherwise. If staff are unsure of how to address an individual, Mr, Miss, Ms, it is better to ask. The terms trans woman (male to female individual) and trans man (female to male individual) are used, in accordance with the preference of the trans communities.

The diagnosis of Gender Dysphoria may be made, in conjunction with the patient, when he or she expresses some level of inconsistency between the psychological identification as male or female, and the phenotype. Generally speaking, where the inconsistency between phenotype and gender identification has resulted in a profound and persistent discomfort, over a period of approximately two years or more, there may be a medical need to transition to the opposite phenotype and gender role from that in which the individual has lived up to this point.

Ideally, a Gender Identity Clinic (GIC) should have a multi-disciplinary team offering voice training, advice about dress, deportment, make-up and hair management (including, where necessary, wigs) and hair removal treatments for trans women; psychological support should be available for all trans patients, as well as the possibility of family support if the patient so wishes. Throughout, treatment should be flexible and patient led, as far as is consistent with clinical safety. The patient and his or her specialist Psychiatrist will work in partnership with each other and also liaise with the GP, to identify both the care pathway and the health professionals who will be suited to providing the best patient care. This should be done on a case by case basis. As the commissioner, the GP will regularly review, with the patient, the effectiveness of treatment, and may make adjustments to the treatment plan accordingly. All medical practitioners should take full account of the individual's view of his or her treatment needs, and also of the scheduling of that treatment. Different levels of medical intervention: psychotherapeutic, hormonal and surgical, may be appropriate for different personal experiences of the inconsistency between psychological identification and phenotype. Surgery may involve realignment of genitalia, gonads and secondary sexual characteristics to accord, as far as possible, with the gender identity experienced by the individual.

### **Adults**

- The Mental Health Professional should endeavour to develop a relationship of trust with the patient
- Take a full medical history including the past, and present, experience of gender dysphoria
- Assess individual and provide provisional diagnosis of gender dysphoria, progressing to confirmation (or not) of diagnosis
- Screen for any other conditions or illnesses which require prior or parallel treatment
- Ascertain, as far as possible, what level of treatment the individual seeks to attain; what does he or she feel would achieve a comfortable gender/sex status
- Inform the individual about the full range of treatments available, the options and limitations of the treatments
- Explore with the patient the various options available for preserving reproductive capacity (such as gamete storage) and explain the effect of hormone therapy and surgery on fertility
- Provide specific information about local, private or NHS facilities suitable for storage of gametes and encourage the patient to think about whether they might wish to have a family in due course. This is especially important in younger people who may not have considered having a family thus far
- It is inappropriate and may be considered misconduct for the psychiatrist to assume that a patient who opts for gamete storage, or has already done so, is in any way equivocal about, or not committed to, the transition process. Withdrawal or delay of treatment under these circumstances is not acceptable practice

- Initiate hormone checks and health checks (if not already underway). These checks may be done by an Endocrinologist or at a specialist GIC, or through a GP with specialist experience, where hormone protocols have been agreed between the Endocrinologist and the other clinicians involved in the patient's treatment. (see above under GPs' guidelines)
- Introduce the individual to appropriate treatments available immediately, e.g. (for trans women) hair removal by electrolysis/laser, voice training, dress and presentation advice etc. These treatments may be provided by colleagues in the GIC team. Ideally, a GIC should offer, in addition, dress, deportment, (unless these treatments are already underway via the GP)
- Ascertain what family support is available to the patient and liaise with, and support family members if possible, but only if the individual concerned wishes it.
- Initiate hormone treatment, according to dosage and monitoring protocols agreed by the Endocrinologist, after all the initial health and hormone base levels have been ascertained. Hormone treatment will not normally be initiated in less than a three month period of assessment.
- Patients must be 16 years old to start irreversible hormone treatments.
- An INFORMED CONSENT form (Annex B[1][2][3] may be used in conjunction with NHS forms) must be made available 4 weeks before treatment commences and be signed by patient and doctor. The information must be presented in such a way that the patient has the capacity to comprehend it, and to make a decision based on it. At present no individual can give or withhold consent to treatment on behalf of another person (unless mental health legislation applies).
- Usual hormone treatment for trans women is oestrogen is 2mg daily of oestradiol (possibly oestradiol patches for those over 40 years old) in conjunction with anti-androgen treatments:
- Usual hormone treatment for transmen is Goserelin depot injections (3mg every 4 weeks); less recommended Cyproterone Acetate (100mg daily), or alternative similar preparation, in conjunction with a depot testosterone injection such as testosterone emanthate (or Sustanon) of 250 mg intramuscularly each two weeks (see monitoring and treatment protocols at A[1] & A[3]). Other forms of administration, such as oral or transdermal patches are sometimes preferred .
- Occasionally, psychotropic medications prior to or concurrent with hormone therapy, will be necessary.
- If patient and doctor think it appropriate, a real life experience (RLE) may be initiated at any time. The vast majority of trans women patients prefer to have established their hormone treatment for some time before embarking on the RLE, and it enhances, enormously, the success of the RLE.
- It is also a great advantage if removal of facial hair is completed or at least well under way, before RLE is commenced.
- The RLE may enable the individual to assess his or her own ability to function: as a student; in the workplace; in the family; in society, using the gender appropriate name, dress, documentation.
- The RLE is not a test, and does not provide a diagnosis; the RLE must be accommodated to the patient's home and work circumstances, as well as the patient's own needs. The clinician should discuss the possible negative consequences: familial, vocational; interpersonal; educational, economic and legal. Despite supportive legislation, possible discrimination could lead to divorce, loss of contact with children and unemployment. The clinician has a responsibility to mitigate, as far as possible, any potential negative effects of RLE by, for instance, providing relevant literature for family/employers etc., involving family members where the patient wishes this, allowing RLE to be taken at the pace that is comfortable for the patient. The RLE is not appropriate for all gender dysphoric patients: a few, for a variety of reasons, for instance, for family, employment, social or even religious convictions, will choose to undergo treatment, whilst retaining the presentation and gender role which is consistent with their original phenotype. To insist on the RLE under these circumstances could be intensely damaging.
- Clinicians should be aware that the RLE, although regarded as a reversible treatment, may have long lasting detrimental effects, if forced on patients without regard to their own wishes or their personal circumstances.

- Provide letter, unless already provided by GP, confirming patient is undergoing treatment for transsexualism, which may be presented for the purpose of changing documentation , e.g., obtaining a new record of name and gender from the Registrar General, passports and driving licences, and authorising the use of appropriate changing and toilet facilities. Where an employer is unaware of the patients situation, certificates for time off work may need to be carefully worded so as not to breach confidentiality.
- Refer for surgery at the appropriate time. Surgeons should always be those with particular expertise of working with trans men or trans women. Even if the referral for surgery is to a surgeon within the same GIC, a written confirmation of reasons for believing that the patient is ready for this step should be carefully recorded. This record, or a letter of referral to an outside surgeon, should cover the following: diagnosis, length of association with patient, any relevant history of hormone therapy and RLE, family or other support if known.
- A letter of recommendation should be endorsed by a (second) relevant medical practitioner, psychiatrist, clinical psychologist, endocrinologist or other, having experience in the field and personal knowledge of the individual concerned gonadal and genital surgery; one letter of referral will normally be sufficient for breast augmentation (trans women) and mastectomy (trans men).
- Arrange post-operative assessment, by the Endocrinologist, of trans men and trans women to ensure ongoing hormone needs are being met.
- Continue on-going support throughout period of transition and post-operatively, if this is deemed necessary and desired by the patient
- Psychotherapy is not an absolute requirement. Not every adult gender patient requires psychotherapy in order to proceed with hormone therapy, a real-life experience or surgery.

### **[A3] GUIDELINES FOR ENDOCRINOLOGISTS ON STANDARDS OF CARE FOR GENDER DYSPHORIA/TRANSSEXUALISM**

Trans men and women should be addressed and accommodated according to their core gender identity. If medical and/or administrative staff are unsure of how to address an individual, Mr, Miss, Ms, it is better to ask. The terms trans woman (male to female individual) and trans man (female to male individual) are used, in accordance with the preference of the trans communities.

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It is usual for the Endocrinologist to be working as part of a medical team charged with the care of gender dysphoric and trans individuals. Where this is not the case, the Endocrinologist should be well versed in the field of hormone treatment for individuals with this condition. The administration of hormones is an absolutely central ingredient of treatment as it supports the individual in living successfully in role and may be regarded as a medical necessity in such circumstances. Therefore, if a patient chooses to undergo a 'real life experience' (RLE), hormone administration should be offered before, or concomitantly with, the commencement of that treatment pathway. Hormones improve the quality of life and limit any psychological/psychiatric difficulties which may arise as a result of lack of treatment. It should be noted that some patients have already started taking hormones without prescription, by buying them via the internet or by other means.

Hormone therapy can also provide significant comfort to patients who do not wish to transition fully, or who are unable to do so. In some patients, hormone therapy alone may provide sufficient symptomatic relief to obviate the need for living in the role opposite to that assigned at birth, or for undergoing gender confirmation surgery. These patients should not be required to do a RLE. Treatment should be flexible, and, as far as is consistent with clinical safety, it should be patient led.

- Hormone therapy will not usually be commenced until a period of assessment by a Psychiatrist or other relevant clinician has taken place. This period of time should be flexible in length and respond to the individual's needs, but approximately three months may be deemed sufficient.
- Hormone therapy should not be undertaken until all necessary health checks have been completed, including base-line hormone checks and checks for other intersex conditions. This work will be done either by the Endocrinologist, or by the GIC, or the GP. These tests should be run in parallel with the above assessment.
- Explore with the patient the various options available for preserving reproductive capacity (such as gamete storage) and explain the effect of hormone therapy and surgery on fertility
- Provide specific information about local, private or NHS facilities suitable for storage of gametes and encourage the patient to think about whether they might wish to have a family in due course. This is especially important in younger people who may not have considered having a family thus far
- It is inappropriate and may be considered misconduct for the Endocrinologist to assume that a patient who opts for gamete storage, or has already done so, is in any way equivocal about, or not committed to, the transition process.
- Maximum physical effects of hormones may not be evident until two years of continuous treatment have been undertaken
- Factors which create greater health risks associated with hormone treatment are: those at risk of cardiovascular disease: heart disease, hypertension, clotting abnormalities, cigarette smoking

(especially where surgery is anticipated), high alcohol consumption, obesity, advanced age (although many late transitions are very successful) malignancy and endocrine abnormalities.

- Methods of hormone delivery include: oral, injectable and transdermal systems.
- Patients will normally be at least 18 years old before estrogen or androgen treatments are initiated

### **Specific Monitoring Protocol for Trans Women**

- Increased morbidity has been described, in trans patients who are being treated with hormone therapy. This particularly applies to trans women patients. An increased risk of thromboembolism has also been described, which may be related to raised prolactin levels. However, this may have been the result of excessive dosage in the level of hormones used, particularly oestrogens. Modern therapy can effectively inhibit the secretion of the undesired gonadal hormone rapidly. With the use of exogenous dosage of oestradiol, rather than equine oestrogens which cannot be measured in blood nor, therefore, monitored, the oestrogen levels can be kept within the normal female physiological range. Hopefully, therefore, the increased risk should not occur.

The following notes are guidelines which may need to be adapted to suit the individual patient.

n.b If the continuing treatment is to be undertaken by the patient's GP, the hormone treatment and monitoring protocols should be provided, in writing, to the GP.

### **Before hormone treatment commences:**

General examination to include: full medical history, and family medical history, physical examination

- Blood pressure, urine, weight, height; calculation of body mass index (BMI)
- Check for pelvic malignancies and other genital abnormalities:
- Recommended laboratory tests for baseline levels:
- Serum testosterone, sex-hormone binding globulin, oestradiol, LH & FSH, prolactin, free-thyroxine TSH liver function tests (LFT), urea and electrolytes, FBC, fasting cholesterol and triglycerides.
- All the implications of embarking on hormone treatments must be discussed in full, including potential, unwanted side effects and any irreversible effects. The GP should ensure that this discussion has taken place either between him/herself and the patient, or between any other relevant clinician and the patient. An INFORMED CONSENT FORM (Annex B[1][2]) must have been made available to the patient at least 4 weeks prior to the commencement of treatment; it must be discussed and signed by the GP or other clinician and the patient. The information must be presented in such a way that the patient has the capacity to comprehend it, and to make a decision based on it. At present no individual can give or withhold consent to treatment on behalf of another person (unless mental health legislation applies). If the GP has not been a party to the completion of the form, he/she should have sight of it and should discuss its contents with the patient. Methods of hormone delivery include: oral, injectable and transdermal systems.
- Prior to commencing treatment, patients should also be advised that smoking is contra-indicated, especially where surgery is eventually anticipated. Alcohol should be limited to 14 units a week at most. The combination of hormones and alcohol can pose a health risk. Obesity also increases risk to health.
- Trans women treated with oestrogens can expect: breast growth, some redistribution of body fat, decreased upper body strength, softening of the skin, decrease in body hair, slowing or stopping the loss of scalp hair, decreased fertility and testicular size, less frequent, less firm erections and decreased libido
- Most of these changes are reversible although breast enlargement may not be entirely so, except through surgical intervention.

- Patients should be advised that cessation of hormones for a few weeks will cause beard growth to return, especially where hair-removal treatments are incomplete.
- Advise that the effect of hormones on the breasts will be to make them lumpy and tender for a while. Teach the patient how to examine her own breasts as they develop

**Hormone Treatment of Trans Women (Mimms and BNF should be consulted for additional information regarding contra-indications of specific medications)**

Hormones are usually prescribed by Endocrinologist or specialist Psychiatrist at a Gender Identity Clinic, where treatment protocols have been agreed with the team's Endocrinologist, but may be prescribed by a GP who is a specialist in the field in accordance with a regimen agreed by a specialist Endocrinologist. As stated above, the following protocol is a suggested guide, and should not be followed rigidly, but tailored to the individual's need.

- It has been conventional to try to inhibit male hormone action using the antiandrogen Cyproterone Acetate, using a dose of 100mg daily (two doses). While this is effective, it can cause liver abnormalities and depression. A safer and more effective alternative is to use a depot injection of an analogue of the gonadotrophin releasing hormone such as Goserelin. This is usually started as a 3mg subcutaneous pellet injected every four weeks or a larger dose can be given three monthly by subcutaneous injections. This inhibits secretion of the pituitary gonadotrophins and testosterone secretion producing a "chemical castration". This therapy is without side-effects as long as hormone replacement with oestrogens is given. Dianette (low dose cyproterone and E2) is also in use as it is less hepatotoxic than high dose CPA and may be used with oestrogen/progesterone combinations. Low dose Finasteride, which blocks conversion of androgens to the more active testosterone, may also be given to discourage male-pattern hair loss.
- Oestrogen is best administered as oestradiol, which is the physiological oestrogen, which can be monitored in blood. Other oestrogen formulations, such as ethinyl oestradiol, or equine oestrogens (e.g. Premarin) are not physiological human hormones and cannot be measured in the blood nor related to normal physiological level.
- The starting dose of oestradiol is 2 mg daily. Alternatively (for trans women over 40 years old), transdermal patches may be recommended as they may lessen the risk of deep vein thrombosis (dosage between 50 and 150mcg used two to three times per week. This dosage will be combined with Goserelin or Cyproterone Acetate.

**Monitoring Ongoing Hormone Treatment of Trans Women**

- general and emotional health
- After 2 to 3 weeks serum oestradiol levels should be monitored and a standard time point after the tablet is solid, e.g. at 24 hours after the tablet is taken, or 48 hours after the application of a patch. At this time circulating oestradiol levels of between 600 and 800 pmol. per litre should be the aim, i.e. high follicular phase levels. Dosage of oestradiols should then be increased or decreased to achieve this therapeutically desirable range.
- Circulating LH, FSH and oestradiol levels to be monitored as indicated above until an effective, therapeutic regimen is established.
- Thereafter, fasting glucose, circulating lipids, liver function tests, haemoglobin and prolactin should be measured six monthly for one year, and then yearly.
- Serum prolactin monitoring may cease after three years if it remains in the normal range.
- During and following this period, blood pressure and weight should be checked at 3, 6 and 12 months and yearly thereafter.
- Check legs for any signs of Deep Vein Thrombosis (DVT)
- Surgeon and/or Endocrinologist may require the patient to cease hormone treatment for up to 6 weeks prior to surgery. Patients should be made aware that this may be a distressing period during which they experience mood swings

### **Hormone Treatment & Monitoring Post-Surgery for Trans Women**

- From 4 weeks post-operatively resume oestradiol (or other oestrogen treatment) in low doses, building to 2mg daily (plus antiandrogen if necessary to support on-going hair removal treatment)
- Dose regimens need to be monitored once again, as above, to ensure that the dose requirements remain the same. It is wise to undertake a bone scan to be sure that bone density remains normal on the oestrogen replacement therapy in the orchidectomised patient, yearly for six years, then from time to time depending on the age of the patient.
- Check BP, weight, urinalysis, oestradiol and cholesterol and prolactin levels at 1, 2 and 3 years post-operatively, then, cease, if test results are stable and no hyperprolactaemia occurs.
- Trans women undergoing oestrogen treatment should be monitored for breast cancer.
- Note that a height reduction could indicate osteoporosis.

### **Surgery**

- Endocrinologist should be aware that surgery may include orchidectomy, penectomy, vaginoplasty, clitoroplasty and labiaplasty. The most usual technique involves penile skin inversion. Sexual sensation is an important objective in vaginoplasty and clitoroplasty, along with the creation of a functional vagina.

### **Specific Monitoring & Treatment Protocol for Adult Trans Men**

#### **Before treatment commences, general examination to include:**

- Patient's full medical history and any relevant family medical history. If an internal vaginal examination and smear test is deemed necessary, the patient should have a full explanation of the reasons for this. Medical practitioners should be aware that trans men may feel particularly sensitive to this examination and may refuse it. This refusal must not prejudice ongoing treatment. It is the duty of the examining physician to be sure that the patient has had a full and adequate explanation of any adverse implications of this refusal. (See Annex B[8b]) for suggested Informed Refusal form (may be used in conjunction with relevant NHS forms)
- BP, weight, height, calculation of BMI, urinalysis
- Regular examination of breasts should continue, especially where the family history indicates a predisposition to developing breast cancer.
- Laboratory tests:
- FBC, renal and liver, bone (calcium & phosphate), free thyroxin TSH, fasting cholesterol, triglycerides and glucose, LH, FSH, oestradiol, testosterone and prolactin.
- Scan for detection of ovarian cysts and fibroids
- All the implications of hormone treatments must be discussed in full, including potential, unwanted side-effects, such as cardio-vascular disease (any family history of CV disease or diabetes is relevant) and any irreversible effects, such as deepening of the voice and growth of facial hair. The GP should ensure that this discussion has taken place either between him/herself and the patient, or between any other relevant clinician and the patient. An INFORMED CONSENT FORM (Annex B[3]) may be used in conjunction with NHS consent forms) must have been discussed and signed by the GP or other clinician and the patient. If the GP has not been a party to its completion, he/she should have sight of the form and should discuss its contents with the patient. The information must be presented in such a way that the patient has the capacity to comprehend it, and to make a decision based on it. At present no individual can give or withhold consent to treatment on behalf of another person (unless mental health legislation applies).
- Individuals should be warned of the increased risk if they smoke, drink alcohol in excess of 14 units a week or are significantly overweight. The GP should offer relevant advice where these factors are present.

- The patient should be advised that menstruation will cease between 3 and 6 months after the commencement of treatment; by three months, the voice will have deepened and beard growth will be starting. Between 9 months and 12 months, male-pattern facial hair will become established.
- The patient should be advised that once treatment commences, the breasts should be checked regularly (especially prior to mastectomy); any abnormal vaginal bleeding should be reported

**Hormone Treatment for Trans Men (Mimms and BNF should be consulted for additional information regarding contra-indications of specific medications)**

Hormones are usually prescribed by Endocrinologist or specialist Psychiatrist at a Gender Identity Clinic, where treatment protocols have been agreed with the team's Endocrinologist, but may be prescribed by a GP who is a specialist in the field in accordance with the protocol agreed by a specialist Endocrinologist. The following protocol is a suggested guide, and should not be followed rigidly, but tailored to the individual's need.

- If an internal vaginal examination has not been performed at an earlier stage, and is still deemed advisable, there is now a further opportunity for the GP to raise the issue again, giving the patient a full explanation of the reasons. As stated above, medical practitioners should be aware that trans men may feel particularly sensitive to this examination and may refuse it. This refusal must not prejudice their ongoing treatment. It is the duty of the examining physician to be sure that the patient has had a full and adequate explanation of any adverse implications of this refusal. A form indicating Informed Refusal should be signed by patient and practitioner (Annex B[8b])
- Goserelin depot injections, or alternative similar preparation, should be started together with a depot testosterone injection such as testosterone enanthate of 250 mg intramuscularly each two weeks. After 2 such injections voice changes are largely irreversible except by surgical intervention. (see Annex A[4])
- An alternative to an injection of testosterone is the use of oral testosterone undecanoate which unlike other oral testosterone preparations does not have hepatotoxic effects. Usual doses will be 120-160 mg daily.

**Monitoring of Hormone Treatment of Trans Men**

- After 2 to 3 injections, serum testosterone levels should be measured, just before an injection is due. A level just above or just below the lower end of the normal male range of serum testosterone is the desirable level at the time of the next injection. Levels at this point, at or above the middle of the normal male range, will lead to accumulation of excessive levels of testosterone in the ten days after an injection, which is likely to have an adverse effect on the arterial system and on haemoglobin.
- If oral testosterone undecanoate is prescribed, this cannot effectively be monitored using serum testosterone levels because it is preferentially converted in the gut wall to a more active metabolite, dihydrotestosterone. Effective replacement of this preparation would be reflected by a serum dihydrotestosterone level, twice the upper limit of normal, but a subnormal serum testosterone level, in a blood sample obtained 3 – 4 hours after a morning dose. Serum testosterone may remain subnormal.

**Monitoring of Goserelin Dose in Trans Men**

- Serum LH and FSH levels should be obtained, 2 – 3 weeks after Goserelin is given, to demonstrate full suppression of pituitary gonadotrophin levels. This is best done after the second and/or third injection.

**Also During the First year at three months, six months and twelve months( and thereafter yearly)**

- assess patient's psychological and physical wellbeing
- BP, weight and urine tests, legs should be checked for peripheral oedema
- Check breasts
- Renal, liver, fasting cholesterol, and triglycerides prolactin levels, LH and FSH, oestradiol, testosterone (and dihydrotestosterone if appropriate) as indicated above, to ensure that an adequate dosage regimen is established
- It is not necessary for hormone therapies to cease pre-operatively

**Post-oophorectomy and Hysterectomy**

- Androgen (testosterone) treatment may be resumed from 4 weeks post-operatively
- Warn that alcohol intake should be limited to 21 units per week,
- Assess the patient's psychological and physical condition
- BP, weight, check legs for oedema
- Check renal, liver, fasting cholesterol, and prolactin levels, triglycerides, LH and FSH, oestradiol, testosterone (and dihydrotestosterone if appropriate) at 3 months, as indicated above, to ensure that an adequate dosage regimen is re-established. Ongoing blood tests should no longer be necessary unless risk factors exist. Androgen treatment will continue unless contra-indicated. Regular examinations for breast cancer should be done, even after mastectomy, especially where there is a family history of this disease.

**Ongoing Possible Surgical Procedures – Phalloplasty**

Endocrinologists should have an overall understanding of the possible procedures.

Not all trans men seek phalloplasty, but if they do, the implications should be discussed in full and properly informed consent given, as with all other procedures. This will be done with the surgeon.

- The Endocrinologist may need to refer the individual for electrolysis or for laser treatment, in order to remove hair from the donor site if this treatment is not already underway
- The individual needs to understand that phalloplasty involves several surgical procedures over a period of time.
- The possible alternative levels of surgery available. Procedures may include: metoidoplasty (creation of micropenis), scrotoplasty, urethroplasty (penis through which urine may be excreted), placement of testicular prosthesis, and phalloplasty, a full sized penis and/or a penis which can be made erect.

**Post – surgery**

- The individual will require the same care as any other patient following major surgery with particular attention to the donor-site care. This will usually be the responsibility of the surgeon's follow-up team and the GP.

## **[A4] STANDARDS OF CARE FOR GENDER CONFIRMATION SURGERY**

Transsexual people should be addressed and accommodated according to their core gender identity unless they specify otherwise. Where no sex confirmation surgery has yet been performed, a sensitive approach to accommodation is to be taken, following discussion with the patient. If medical and/or administrative staff are unsure of how to address an individual, Mr, Ms, Miss etc. it is better to ask. The terms trans woman (male to female individual) and trans man (female to male individual) are used, in accordance with the preference of the trans communities.

Surgery is an integral and necessary part of the treatment for profound and continuous gender dysphoria, i.e., transsexualism. It should not be regarded as purely elective or cosmetic, but rather as a 'corrective' procedure. Surgery harmonises, as far as possible, the external and internal morphological sex characteristics with the gender identity experienced psychologically. Surgical intervention usually follows a period of hormone treatment; this may be accompanied by a period living in the gender role which is opposite to that assigned at birth. Occasionally, in the case of trans men individuals, a mastectomy may be done after a period of hormone administration but before the experience of living in the male gender role. A flexible approach, taking account of the patient's needs and wishes, should be taken.

General points:

- It is essential that the surgeon performing any transition surgery be experienced in this highly specialised field. Usually, this will be either male to female or female to male; rarely both.
- It is unethical to deny gender confirmation surgery on the grounds of blood seropositivity for blood-borne infections such as HIV or hepatitis B or C.
- The surgeon should have the written recommendation of two relevant physicians. If these are not part of the GIC team, of which the surgeon is a member, then he or she will need to verify the bona fides of the referring physicians to establish that they have relevant experience of working with gender dysphoric individuals and can give cogent reasons for the referral.
- Ideally, the surgeon should have a close working relationship with other professionals in the team currently treating and supporting the individual.
- The surgeon and the patient should have the opportunity to discuss the patient's history and diagnosis of transsexualism so that the surgeon is comfortable with the decision to perform genital (or other) surgery and is not agreeing to do it merely on the basis of the opinions of other clinicians.
- The patient and the surgeon need to be sure that this step is necessary in order to consolidate the gender identity of the individual
- Patient and Surgeon should decide, jointly, on the nature and extent of surgery.
- Any pre-existing medical conditions must be monitored
- The effects of hormonal therapy up to this point must be investigated
- A full urinogenital assessment must be done
- It is important that the surgeon ascertains whether advice has already been given and fully considered, regarding post-operative infertility. If not, the surgeon should provide appropriate information about any options available at the surgical stage might enable the trans person to preserve reproductive capacity, such as mechanical sperm retrieval and cryogenic storage of removed testes and ovaries.
- Informed consent is essential for the protection of both the patient and the medical practitioner. A written INFORMED CONSENT (Annex B[6][7][8a]) form must be provided at least eight [8] weeks before surgery. These may be used in conjunction with NHS consent forms All adverse, short and long-term effects must be discussed and the form completed, and signed by the surgeon and the patient. Above all, the patient must be clear that genital surgery is irreversible. The Form must explain all surgical procedures, all possibilities of failure of surgical objectives in terms of sensation and cosmetic appearance. Any scarring and other limitations of surgery, whether functional or cosmetic, must be fully explained before the procedures are carried out. After care should also be explained on the form. The information must be presented in such a way that the patient has the capacity to comprehend it, and to make a decision based on it.

- At present no individual can give or withhold consent to treatment on behalf of another person (unless mental health legislation applies).
- It is unlikely that surgical interventions will be undertaken before the age of 18.
- The surgeon may be asked to provide written confirmation of gender confirmation surgery for the purposes of altering documentation, such as obtaining a new record of name and gender from the Registrar General, changing passports and driving licences, and to authorise the use of appropriate changing and toilet facilities..

### **Specialised Surgery for Trans Women**

- Genital surgical procedures may include orchidectomy, penectomy, vaginoplasty, clitoroplasty and labiaplasty. The most usual technique involves penile skin inversion. Sexual sensation is an important objective in vaginoplasty and clitoroplasty, along with the creation of a functional vagina.
- Older trans women may have less ‘material’ available from which to create a vagina. The length of time required for such surgical procedures may, in any case, mean that they will be contra-indicated.
- These procedures may not be achieved in one single operation. Follow-up surgery may be required.
- The ‘INFORMED CONSENT’ form (see Annex B[6][7]) should be made available at least 8 weeks before each stage of surgery; the form, which may be used in conjunction with NHS or other hospital consent forms, should indicate what the goals and anticipated outcomes are (see above). Above all, the patient must be clear that genital surgery is irreversible. The Form must explain all surgical procedures, all possibilities of failure of surgical objectives in terms of sensation and cosmetic appearance. Any scarring and other limitations of surgery, whether functional or cosmetic, must be fully explained before the procedures are carried out. After care should also be explained on the form. The information must be presented in such a way that the patient has the capacity to comprehend it, and to make a decision based on it.
- These procedures require skilled surgery and post-operative care. The patient needs to have careful instruction in post operative care, e.g. dilation and douching of the vagina. The GP may be contacted so that the assistance of a District or Practice Nurse may be sought.

### **Other possible surgeries:**

- Breast augmentation in trans women may follow a period of hormone therapy, sufficient to demonstrate that the therapy alone will not increase the breast development to the desired level – usually 18 months. Desirable that a surgeon with experience in breast augmentation for trans women perform this surgery.
- Thyroid chondroplasty and other feminising cosmetic facial surgery does not require letters of recommendation from mental health professionals.
- Voice modification is not yet regarded as an entirely successful surgical intervention. The resultant voice, although higher in pitch, tends to be flat in tone, lacking the ‘female’ modulation. If it is undertaken, it should only be done after all other surgery, requiring general anaesthesia and intubation, is complete.
- After gonadectomy, the patient may need to be referred back to an Endocrinologist or other relevant clinician, to discuss the appropriateness of reducing hormone dosage, unless (trans women) antiandrogen treatment, prior to surgery had already enabled feminisation to be maintained on a lower dose of oestrogen.
- Short and long-term follow-up care should be offered after each procedure.

### **Specialised Surgery for Trans Men**

- Some or all of the following procedures mentioned below may be undergone. Procedures will involve several operations and be staged over time. Informed consent is required before embarking on surgery, and at each stage through the various procedures. It may well be that decisions and goals will have to be adapted over time. Individuals need to understand that not all goals will be available for all individuals, especially in the field of creating external genitalia to varying degrees of cosmetic and functional sophistication. Much depends on the health and anatomical make-up of each individual.
- An internal vaginal examination will almost certainly be required and the reasons for this should be explained carefully to the individual. Any urinogenital symptoms should be explored and taken into account.
- The 'INFORMED CONSENT' form (Annex B[8a]) should be made available at least 8 weeks before each stage of surgery; the form, which may be used on conjunction with NHS or other hospital consent forms, should indicate what the goals and anticipated outcomes are. (see above) Above all, the patient must be clear that genital surgery is irreversible. The Form must explain all surgical procedures, all possibilities of failure of surgical objectives in terms of sensation and cosmetic appearance. Any scarring and other limitations of surgery, whether functional or cosmetic, must be fully explained before the procedures are carried out. After care should also be explained on the form. The information must be presented in such a way that the patient has the capacity to comprehend it, and to make a decision based on it.
- Mastectomy is likely to be performed before any other surgery in female to male individuals. Different techniques are available and should be discussed in full with the patient. An excellent guide to breast surgery for trans men is available from FtM London, written in conjunction with Mr Dai Davies, Consultant Surgeon. [Info@ftmlondon.org.uk](mailto:Info@ftmlondon.org.uk))
- Monitoring for breast cancer is still necessary, especially where the family history indicates a predisposition.
- There is no requirement to reduce hormone therapies pre genital surgery
- Hysterectomy, salpingo-oophorectomy, vaginectomy, metoidioplasty, scrotoplasty, urethroplasty, phalloplasty
- After oophorectomy, the patient may be referred back to the Endocrinologist to discuss the ongoing hormone dosage.
- Short and long-term follow-up care should be offered after each procedure, with particular attention to donor-site care. Liaison with the GP may be advisable so that aftercare can be provided by the Practice Nurse or a District Nurse, where necessary.

**[A5] STANDARDS of CARE GUIDELINES for GPs on the TREATMENT OF CHILDREN  
& YOUNG PEOPLE with GENDER DEVELOPMENT ISSUES**

A child or young person who is experiencing unusual gender development may or may not continue to experience the condition of gender dysphoria in adulthood. However, it is vital that the individual concerned is shown understanding and respect for his or her current gender experience. Treatment should be flexible and meet the needs of the individual as far as is consistent with clinically safe practice. Decisions about the nature and the extent of treatment may be taken by a young person if deemed to be Gillick competent by the practitioner. From 16 onwards the young person is automatically deemed Gillick competent (see below) Any young person deemed Gillick competent may, effectively, exclude a relevant adult (one with Parental Responsibility – see below) from the decision making process, but this would be *extremely* unusual and, in most cases, undesirable.

#### The General Practitioner

- Gender development disorders are rare in children and adolescents. They are sometimes associated with emotional and behavioural difficulties.
- Gender disorders in young people can be manifested in different ways: cross-gender play and interests, sometimes accompanied by an expressly stated wish to belong to the opposite gender to that assigned, or even a claim to actually be a member of the opposite gender.
- Associated with these symptoms may be a dislike of the sexual appearance of the body. This may be more marked if pubertal changes have started.
- Children and adolescents should be referred to a specialist team, where there is expertise in caring for younger individuals who are experiencing gender development issues.
- Initially, it is likely to fall to the GP to ensure that the young person and [bearing in mind the constraints of confidentiality] the young person's family, are fully informed of all the possible treatments and their outcomes, positive and negative. A young person who is deemed Gillick competent may refuse family involvement. Any information given to a child must be age appropriate. Educational literature and ongoing support of the family should be provided.
- If, whilst under the care of a specialist Clinic, an adolescent is prescribed hormone blocking therapy at any time during puberty, the GP may be involved in ongoing treatment.

The GP should continue to liaise with the Endocrinologist at the Clinic, to ensure that the necessary, preliminary health checks are achieved and that responsibility for continuing monitoring is agreed.

- It is an essential requirement, prior to embarking on any reversible or partially reversible treatments, that a young person be Gillick competent. An INFORMED CONSENT form (Annex B [4][5]) must be provided to the individual and (for those under sixteen) the person with Parental Responsibility, at least six [6] weeks in advance of the treatment starting. The Clinic will usually be responsible for providing the Form and will have had the necessary discussions with the individual and relevant adult. The GP should also check that this protocol has been covered and should provide a further opportunity for discussion with the patient and his/her family.
- It is important to make the young person feel that help and support is available and that, under certain circumstances the effects of puberty can be delayed by medication. Depression and even suicidal feelings can be experienced by a young person who is faced with the prospect of pubertal changes, or who is already experiencing them. Much reassurance will be needed to make individuals feel that their condition is experienced by others, that although rare, it is not unique and can be treated.
- It is particularly important that where possible and appropriate, when a young person of male phenotype identifies as female, that beard growth is blocked, and that where a young person of female phenotype identifies as male, breast growth is blocked.

- If the GP is to provide ongoing prescriptions for any hormone blocking treatment, then liaison with the relevant Endocrinologist is important. Referral to, and liaison with, local psychological support systems should continue for the child/adolescent concerned and his/her family. Liaison with a school or college may be required, with the consent of the young person, and relevant literature provided.
- Sometimes these manifestations gradually disappear altogether, especially if the child presents before puberty, sometimes they resolve into a gay or lesbian sexual preference, sometimes the cross gender symptoms will persist into adulthood and the individual may then seek further treatment.
- At this stage, referral to adult services will be necessary. (see below) It is vital that there is good communication between those who have been caring for the young person up to that date, and those who will be taking over the future care. The GP has a vital role in liaising with these other agencies and ensuring that they liaise adequately with each other.
- It is especially important with young people, to encourage them to consider whether they may wish, in the future, to have a family. Specific information should be provided about local, private or NHS facilities suitable for storage of gametes .
- n.b. It is inappropriate and may be considered misconduct for any medical specialist to assume that a patient who opts for gamete storage, or has already done so, is in any way equivocal about, or not committed to, the transition process.

*The Guidelines for Specialist Clinics caring for Young People with Gender Development Issues [A6] may also provide relevant information for GPs.*

**[A6] TREATMENT GUIDELINES for SPECIALIST CLINIC caring for YOUNG PEOPLE  
with GENDER DEVELOPMENT ISSUES.**

Stage 1 – Therapeutic Exploration.

- assess and explore the nature of the child/young person’s gender confusion
- address any other emotional and/or behavioural difficulties the individual may have.
- liaise with the family (within the constraints of confidentiality)
- ascertain the young person’s view of how they see themselves and how they wish to progress
- negotiate with the family a way of accommodating the child/young person’s current needs to express his/her gender identity
- help the family to allow the child/young person to communicate his/her feelings of distress
- provide age appropriate information for the child/young person and literature for families, schools
- explain carefully why irreversible interventions cannot be undertaken in the short term, even though they may be available in the longer term
- reassure the child/young person that, if his or her state of uncertainty persists, some level of medical help and support is available
- At the appropriate time, explain to the young person and the family, the disadvantages, as well as the advantages of starting treatment to block pubertal changes, or of not starting such treatment
- Talk about outcomes: impossible, possible, probable
- It is especially important with young people, to encourage them to consider whether they may wish, in the future, to have a family. Specific information should be provided about local, private or NHS facilities suitable for storage of gametes .  
n.b. It is inappropriate and may be considered misconduct for any medical specialist to assume that a patient who opts for gamete storage, or has already done so, is in any way equivocal about, or not committed to, the transition process.
- Allow the child/young person to feel, as far as is consistent with clinically safe practice, that he or she has some control over the situation. Offer choices of treatment and timing of treatment. It is especially important to understand the sense of urgency that young people feel as they approach puberty, or pubertal changes have started. They may become seriously depressed and even suicidal if secondary sexual characteristics develop. Where appropriate, there is a need to pre-empt such changes by hormonal blocking treatment (see below).
- Help the family members to accommodate to uncertainty in the child’s situation
- Liaise with the family GP
- Liaise with the young person’s school

Stage 2 – Reversible Interventions

- Check for any other underlying intersex condition
- If, in the judgement of the Clinician, other Clinic team members, and the young person, it is deemed appropriate to move towards reversible treatments to block puberty, refer to Paediatric Endocrinologist. This will usually be a Clinic team member who should also have met the family to discuss the treatment plan. The Endocrinologist should ensure that all health checks are done, including base line natural hormone production [including testing for other underlying intersex conditions], before prescribing LHRH agonists or medroxyprogesterone to suppress oestrogen or testosterone production and, therefore, suppress secondary sexual characteristics.  
*(Mimms and BNF should be consulted for additional information regarding contra-indications of specific medications)*
- Liaison with the GP is vital, at this stage, as he/she may take over the prescribing of the necessary medication.

- An INFORMED CONSENT (Annex B[4][5]) form for this kind of treatment should be available to the individual, at least six [6] weeks before the treatment commences. The form should be signed by the individual and his or her parent or guardian, or other person with Parental Responsibility [see below] whilst the young person is under 16 years old. After the sixteenth birthday, a young person is deemed ‘Gillick’ competent (see below), and may make decisions about treatment without parental consent. However, it is good practice to continue involving the family even after this age, provided the patient agrees.

### Stage 3 – Partially Reversible Interventions

- If, in the judgement of the Clinician and the young person, it is deemed appropriate to move towards partially reversible interventions, very careful counselling must be undertaken to ensure that the young person, in particular, but also the family, understands fully, the implications of treatment. The treatment includes hormone interventions which masculinise or feminise the body. Reversal may involve surgical intervention.
- An INFORMED CONSENT form (Annex B[1][2][3]) for this kind of treatment should be available to the individual, at least six [6] weeks before the treatment commences. The form must be signed by the individual and his or her parent or guardian, or other person with Parental Responsibility [see below] whilst the young person is under 16 years old, although, in theory, if the clinician deems the young person to be Gillick competent, treatment may progress without the consent of an adult with Parental Responsibility. After the sixteenth birthday, a young person is automatically deemed ‘Gillick’ competent (unless mental health considerations apply), and may make decisions about treatment without parental consent. It is desirable, however, that a relevant adult sign the consent form up to the age of 17.
- It is unusual for even partially reversible treatments to be undertaken before the age of 16. Practitioners may prefer to delay such interventions until the age of 18, but flexibility rather than hard and fast rules should be applied
- In practice, irreversible physical interventions, including surgery are unlikely to be undertaken under the age of 18.
- Throughout, treatment should remain flexible and supportive. As far as possible, there should be partnership and collaboration with local child and adolescent services. Where this is geographically difficult, there should be even greater emphasis on liaison with the local GP, to ensure that he or she is acting as part of the team in prescribing any ongoing medication, as agreed with the Clinic, and is offering support to the individual and the family and, where necessary, is liaising with the school/college.
- If the individual wishes to continue towards transition to the opposite gender role to that assigned at birth, referral to adult services will be necessary. It is vital that there is good communication between those clinicians in the Child and Adolescent Unit, who have been caring for the young person up to that date, and those who will be taking over the future care. The Clinic must liaise with the GP and with the adult specialist services to which the young person will be transferring.
- Communication should include providing a very full report for the clinician assuming ongoing responsibility for the young person. A fully evidenced opinion should be given as to whether (continuing) cross-hormone treatment and, possibly, surgery might be appropriate. This view is, of course, subject to revision. Preferably, the report should be backed up by a personal telephone call or meeting to discuss the case.
- Where a hormone/hormone blocking regimen is already underway, the prescribing Endocrinologist should, ideally, speak personally with the endocrinologist who will prescribe for the individual as an adult.

#### Parental Responsibility and Gillick Competence

- a person with Parental Responsibility will include the natural mother, automatically; the natural father, if married to the mother at the time of child’s birth or having subsequently married her, or having a section 4[1a] Order or 4[1b] agreement (Children Act [CA] 1989); anyone with a Residence Order (s8 & s12, CA 89) or a Care Order (s31, s33[3] CA 89); anyone appointed guardian or having an Adoption Order. Sample Informed Consent forms available from GIRES: <http://www.gires.org.uk>

- ‘Gillick’ refers to a court case, *Gillick v West Norfolk and Wisbeach Area Health Authority* (1985). Gillick competence is deemed to be acquired by the 16<sup>th</sup> birthday. Under that age, it is a matter for the judgement of medical practitioners, whether the child has Gillick competence, which involves, “not merely an ability to understand the nature of the proposed treatment.....but a full understanding and appreciation of the consequences of both the treatment in terms of intended and possible side-effects and, equally important, the anticipated consequences of failure to treat”. (Re R, Lord Donaldson) This might apply where the child and the parent (person with Parental Responsibility) are not in agreement regarding treatment.