Review Article

Transgender Medicine for the General Practitioner

Suja Sukumar[1], Sanjay Kalra[2]

In the recent years more transgender patients are seeking medical care for gender affirmation. Physicians often perceive transgender health care as hopelessly enigmatic. For a primary care physician to provide transgender health care, he/she should know the basics of transgender health, be able to use appropriate language and properly interact, understand cross sex hormone therapy, and the risks and adverse effects associated with it. The aim of this article is to enable primary care physicians to provide basic transgender care. We discuss basic terminology; a few interactive tips; and transgender specific care which includes not only the hormonal and surgical treatment but also their reproductive, metabolic, osteocrine and social health.

[*J Indian Med Assoc* 2020; **118(7):** 24-7]

Key words **: Communication, Gender reassignment, Transgender health, Trans feminine, Trans masculine.**

The transgender community is an important, and integral part of Indian society. According to the Indian Census 2011, there are 490000 transgender individuals in the country[1]. The Government of India has introduced progressive legislation (The Transgender Persons (Protection of Rights) Act, 2019) to ensure that they get their due legal rights[2]. This review is an effort to help these members of society to achieve similar rights in health as well.

Health providers often perceive transgender health care as hopelessly enigmatic. They are often scared that they would offend the patients by using the wrong language or feel they are poorly trained and prepared for the care of transgender patients. We have discussed a few interactive tips for transgender specific care.

Communication :

Communication with transgender patients should be done in a respectful and sensitive manner[3]. Ensure privacy while asking sensitive questions. It is possible that accompanying people may not be aware of a patient's medical, gender and sexuality status. Address patients using their preferred pronouns (masculine or feminine). The name on the records may be in congruent with their appearance. Resist the urge to assume the gender identity and sexual orientation of an individual before you. If you are not sure always respectfully ask how they would like to be addressed. If you address them wrongly don't hesitate to apologize. Do not mention their assigned name at birth as the 'real name', they consider this as a dead name and by asking for real name you imply that their current gender identity is fake.

Editor's Comment :

- **Transgender community members do not get adequate attention at the primary health care level.**
- **One must communicate with them in a sensitive, empathic and respectful manner.**
- **Psychosocial health, legal issues and social modulation must be kept in mind.**
- **Infection prevention, cancer screening, dermatologic conditions and metabolic risk reduction must be addressed.**
- **Optimal care for gender affirmation, osteocrine health, contraception/fertility must be offered.**

Use politically and culturally acceptable words and euphemisms to discuss transgender and sexuality. Ensure that health records reflect a person's chosen gender. Electronic medical records may need to be modified to allow non-binary/third gender descriptions.

These communication skills and sensitivity should be exhibited not only by doctors, but by all health care professionals (Tables 1 & 2). Train your staff to use respectful language and behaviour. Personal biases, religious beliefs, likes and dislikes should not be allowed to interfere with the quality of health care received by any patients. Treat them with respect and courtesy you would like yourselves to be treated with.

Transgender-specific Care

The first and foremost of a health care professional is to do one's homework and learn about the transgender community[4]. Understand that being LGBTQ (lesbian, gay, bisexual, transsexual, queer) is not a choice or disease. Moreover, their medical

[1]MBBS, MD, DNB, MNAMS, DM, Department of Endocrinology, RenaiMedicity Hospital, Kochi
[2]MBBS, MD, DM, Department of Endocrinology, Bharti Hospital, Karnal and Corresponding Author
Received on : 19/03/2020
Accepted on : 10/06/2020

Table 1 — Attributes of a Transgender-friendly Health Care Professional

- Acceptance of each individual's wishes and preferences
- Empathy in words and action
- Inclusive behaviour in health care
- Openness in discussion of person-significant issues
- Up to date provision of health care

Table 2 — The Cardinal Rule for Transgender Care

- Privacy in clinical conversation
- Partnership in decision making
- Provision of appropriate clinical services
- Proper guidance regarding health care
- Proactive support in psychosocial legal care

therapies are not cosmetic, they are life changing and lifesaving. Every ailment that a transgender person get is not due to hormone replacement therapy. They are normal people who can get sick like other normal people.

"Transgender" is an umbrella term that describes people whose gender identity or expression does not match the sex they were assigned at birth. For example, a trans woman may identify as a woman despite having been born with male genitalia, male gonads and male chromosome. Cis gender refers to people whose sex assignment at birth corresponds to their gender identity and expression.Gender dysphoria refers to discomfort or distress that is caused by a discrepancy between a person's gender identity and that person's assigned gender at birth.

Apart from routine medical and metabolic screening, the following issues need attention in certain transgender individuals.

History Taking :

History taking should be carried out in a sensitive manner, ensuring privacy. The hierarchy of questioning should be more from non-threatening to threatening questions, from medical to endocrine challenges, from non-genital to genital issues from non-sexual to sexual topics, and from sexual thoughts and fantasies to actual experiences[5].

Both a medical and a psychological history must be enquired into. Do ask about their family background and support system. Specific questions related to transgender individuals include an organ inventory and history of surgical procedures in the past[6]. Trans feminine patients (Trans women) may have undergone breast augmentation, orchidectomy, facial feminisation surgeries, voice change surgeries, laser hair removals, cosmetic surgery and electrolysis. Trans masculine persons(Trans men) should be asked for history of mastectomy, hysterectomy, oophorectomy, and genital reconstruction. Past and current history of medication use is important as well. Questions regarding hormonal therapy, medical co-morbidities, substance abuse, over the- counter treatment and complementary/alternative medication must be asked. In case of doubt, it is advisable to refer to an endocrinologist.

Psychosocial Health :

Psychological health must be evaluated[6]. Increased rates of suicidal tendencies, anxiety and depression occur among transgender and gender diverse individuals. Quality of well-being can be assessed using validated tools such as WHO-5. Depression can be screened with a simple questionnaire called Whooley's 2-item tool[7]. The Gluco Coper is a validated tool which helps assess coping skills in persons with diabetes[8]. There is a need, however, for an Indian tool to assess the quality of life in transgenders.

Social history should include queries related to sexual orientation, sexual behaviour, partner bonding, partner violence and social acceptance. Instead of loaded questions like 'do you have a husband/wife', the health care provider may enquire whether the patient is in a relationship or is sexually active.

Evaluation and clearance by a mental health provider is an important pre-requisite for initiating cross sex hormone therapy.

Cancer Screening :

Breast cancer screening should be carried out, as per standard of care for cis-gender women, in trans masculine persons. Mammography should be conducted every 2 years for trans feminine persons aged $\geq$50, who have received feminizing hormones for $\geq$5-10years. Cervical screening should be done as per standard of care for all persons with an intact cervix. Many patients may refuse such screening: this should not be taken as a contra-indication for initiation or continuation of testosterone therapy in trans masculine persons[6].

Routine ovarian or endometrial cancer screening is not recommended for low-risk patient. If imaging is required, a trans abdominal or trans rectal ultrasound can be performed. Unexplained vaginal bleeding in a transmasculine person with testosterone-induced amenorrhea must be evaluated in a manner similar to that for cis-gender women[6].

Routine screening for testicular cancer is not indicated for persons with intact testes. It is possible, however, that gender dysphoria may prevent timely self-examination and awareness of testicular lumps. Prostate cancer screening should be done as per standard of care for cis gender men, in trans feminine persons. The intervention threshold of prostate specific antigen (PSA) may be lower in persons on feminizing hormone therapy[6].

Infection Prevention :

Transgender individuals with the history of sexual exposure should also be screened for sexually transmitted diseases, including HIV/AIDS and syphilis as per standard of care. It must be remembered that this community is at high risk of contracting such illnesses. Counselling regarding prevention of sexually transmitted disease is a sensitive (and challenging) subject. Condoms, pre-exposure prophylaxis and post-exposure prophylaxis must be advised as appropriate[9,10].

Hepatitis B and human papilloma virus (HPV) vaccination should be offered[10]. Indian guidelines regarding the universal provision of these vaccines to transgender individuals are lacking.

Metabolic Risk Reduction :

The cardiovascular risk of hormone replacement therapy (HRT) in transgender patients is not clearly known. HRT may elevate serum triglycerides and LDL-C in trans men, though this does not necessarily translate into an increase in adverse cardiovascular event. In trans feminine persons, however, HRT is documented to increase the risk of venous thromboembolism, myocardial infarction and ischemic stroke, in a duration dependent manner. Hence HRT must be individualized based on a patient's goals, the risk/benefit ratio of medications[11].

The desperation and over expectation of transgender patients are real. Some take potentially life-threatening decisions like undergoing illicit surgeries or over the counter medications etc. Our duty is to explain to each patient about the possible risks and adverse effects of the therapy and choose the best option for them.

Persons at high risk of cardiovascular disease must be managed according to standard of care. The indication for aspirin, statins and RAAS blockers are similar in cis-gender and transgender adults. All cardiovascular risk stratification tools are based on binary gender, and will have limited use in screening transgender people.

Osteocrine Health :

Bone health is an area of concern in transgender persons. Individuals who discontinue hormonal regimens after undergoing gonadectomy are particularly at risk. Risk stratification tool such as FRAX (Fracture Risk Assessment Tool) are gender-specific, and may not provide an accurate assessment of a transgender bone health status.

Contraception and Fertility :

Transgender adults of reproductive age group remain fertile, unless they have undergone gonadectomy or hysterectomy. HRT provides a contraceptive effect, but persons who are not on hormonal therapy may need protection against unwanted pregnancy. Condoms and vasectomy in trans feminine persons, and intrauterine devices in trans masculine individuals are other options[9].

Many transgender people will want to sire children. Because feminizing/masculinizing hormone therapy limits fertility, it is desirable to offer the patients options for fertility before starting hormone therapy or undergoing surgery to remove/alter their reproductive organs.

Dermatologic Health :

Skin health issues are frequent in transgenders. Apart from routine illnesses, there are some disorders which are specific to transgender persons, especially those on hormonal therapy. Acne vulgaris and androgenic alopecia can occur in transmasculine persons. Pseudofolliculitis barbae, keloids, melasma (chloasma), lichen sclerosus and silicone reactions are seen in transfeminine individuals. HPV and related skin lesions can be encountered in surgically constructed neovaginas. HIV can present as skin lesions including psoriasis, condylomas, seborrheic dermatitis or dry skin. AIDS can manifest as basal cell, squamous cell or Kaposi's sarcoma[12].

Legal Issues :

Health care professionals should be well versed with current legal requirements before gender reassignment. No intervention, especially surgical or endocrine, should be carried out without informed written consent (or assents, in the case of minors). Multi-disciplinary evaluation, including psychological/psychiatric, surgical and endocrine assessment, is helpful in ensuring safety, for the patient as well as for the health care system[6].

Social Modulation :

Transgender health cannot be optimized unless they are provided with a society and social environment which is friendly and sensitive to their needs. Health care professionals should lead the way in demonstrating the accepting of transgender individuals, through words as well as action. Promotion of transgender health should become an integral part of public health and social medicine.

Limitations :

While India has a significant transgender population, which is visible socioculturally and legally, not much medical and medical anthropological research has been done on them. Transgender medicine is slowly gaining acceptance as part of mainstream endocrinology, but its relevance to primary care has not been highlighted. Keeping these limitations in mind,

this narrative review tries to make health care for transgender persons part of routine medicine.

Funding : None

Conflict of Interest : None

References

1 Transgender in India. Available at: https://www.census2011.co.in/transgender.php. Last accessed on 15 March 2020

2 The Transgender Persons (Protection of Rights) Act, 2019. Available at: http://socialjustice.nic.in/writereaddata/UploadFile/TG%20bill%20gazette.pdf Last accessed on 15 March 2020

3 Rosa DF, Carvalho MV, Pereira NR, Rocha NT, Neves VR, Rosa AD— Nursing Care for the transgender population: genders from the perspective of professional practice. *RevistaBrasileira de Enfermagem* 2019; **72:** 299-306.

4 Hembree WC, Cohen-Kettenis PT, Gooren L, Hannema SE, Meyer WJ, Murad MH,*et al* — Endocrine treatment of gender-dysphoria/gender-incongruent persons: an endocrine society clinical practice guideline. *J Clin Endocrinol Metab* 2017; **102(11):** 3869–903.

5 Kalra S, Balhara YP, Baruah M, Saxena A, Makker G, Jumani D, *et al* — Consensus guidelines on male sexual dysfunction. *Journal of Medical Nutrition and Nutraceuticals* 2013; **2(1):** 5-18.

6 A good practice guide to gender affirmative care. Available at: http://www.sapphokolkata.in/wp-content/uploads/2017/06/GAC-Guideline1.pdf. Last accessed on 15 March 2020

7 Whooley MA, Avins AL, Miranda J, Browner WS — Case-finding instruments for depression: Two questions are as good as many. *Journal of General Internal Medicine* 1997; 12(7): 439-45.

8 Kalra B, Kalra S, Balhara YP, Verma K, Azam AA, Shaikh FA — The GlucoCoper–An Exploratory Study to Assess Coping Mechanisms of Women Diagnosed with Diabetes Mellitus. *European Endocrinology* 2019; **15(1):** 53-6.

9 Krempasky C, Harris M, Abern L, Grimstad F — Contraception across the transmasculine spectrum. *American Journal of Obstetrics and Gynecology* 2020; **222(2):** 134-43.

10 Workowski KA, Bolan GA — Centers for Disease Control and Prevention. Sexually transmitted disease treatment guidelines, 2015. *MMWR Recomm Rep* 2015; **64(RR-03)**: 1–137.

11 Streed CG, Jr, Harfouch O, Marvel F, Blumenthal RS, Martin SS, Mukherjee M — Cardiovascular disease among transgender adults receiving hormone therapy: a narrative review. *Ann Int Med* 2017; **167(4):** 256-67.

12 Whitlock BL, Duda ES, Elson MJ, Schwab PP, Uner OE, Wen S, *et al* — Primary care in transgender persons. *Endocrinology and Metabolism Clinics* 2019; **48(2):** 377-90.

- **"Transgender" is an umbrella term that is used to describe individuals with gender diversity.**
- **It includes individuals whose gender identity is different from their birth-designated sex and/or whose gender expression does not fall within stereotypical definitions of masculinity and femininity.**
- **Gender dysphoria or gender incongruence is defined as distress or discomfort that may occur when gender identity and birth-designated sex are not completely congruent.**
- **Transgender individuals should have their gender incongruence diagnosed by medical professionals with appropriate experience.**
- **It is necessary to ascertain that there is persistent gender incongruence and that the person is able to understand the risks and benefits of intervention**
- **Before initiating transgender hormonal or surgical treatment, the clinician should counsel the patient about risks and benefits of the hormonal or surgical therapy, including impact on fertility, as well as realistic expectations about outcomes.**
- **For transgender women (male-to-female [MTF]), we suggest either antiandrogen therapy (spironolactone or cyproterone acetate [CPA]) or gonadotropin-releasing hormone (GnRH) agonist therapy, combined with estrogen therapy (transdermal or oral 17-beta-estradiol)**
- **The use of ethinyl estradiol is avoided in transgender females because of an increased risk of venous thromboembolism (VTE)**
- **Transgender individuals should follow the screening guidelines for all tissues present, independent of expressed gender.**
- **Transgender women receiving hormone therapy should be monitored to avoid supraphysiologic serum estradiol (E2) concentrations (eg, maintain E2 levels <200 pg/mL [734 pmol/L]) and to verify that serum testosterone levels reach the normal physiologic female range.**
- **Serum potassium should be checked in those taking spironolactone, and monitor serum prolactin and triglycerides because of exogenous estrogen administration.**
- **Gender confirmation (or affirmation) surgeries can be considered after living one year in the desired gender role and after one year of continuous hormone therapy.**
- **For transgender men (female-to-male [FTM]),either testosterone esters (administered intramuscularly or subcutaneously) or testosterone gels are used depending upon patient preference.**
- **Transgender men receiving testosterone therapy be monitored for erythrocytosis and dyslipidemia, two potential adverse effects of androgen therapy.**

Dr Sattik Siddhanta

MBBS(Hons), MD(Medicine), DM(Endocrinology),
Assistant Professor, Dept of Medicine, IPGMER and SSKM Hospital, Kolkata