

## Interventional Radiology

Dear Parents,

Greetings from Delhi Public School, Bopal!

In the recent decades there has been a significant rise in prevalence of vascular diseases. This may be due to increased lifestyle-related diseases, stress and urbanization. The vascular diseases can be prevented by lifestyle changes and exercises. When treating vascular diseases, Interventional Radiological (IR) procedures can replace many traditional open surgeries in diseases like stroke, prostate hyperplasia, varicose veins and certain breast diseases. Thus, (IR) has become a key specialty when it comes to improving patient outcome and improvement.

Hence, we at Delhi Public School-Bopal strive to educate our staff regarding precautions, non-surgical management of stroke, prostate hyperplasia and other vascular diseases. Here is the synopsis of the workshop conducted by Dr. Milan Jolapara (MD, DM) Interventional Neuroradiologist, Peripheral Vascular Interventionist and Dr. Trupti Mehta (MD, FVIR) Interventional Radiologist and Interventional Oncologist from Dev Hospital Ahmedabad for our staff wellbeing

### What is Interventional Radiology?

- Interventional radiology (IR) is a medical subspecialty that uses imaging techniques like sonography, CT scan, MRI and X-rays to diagnose and treat diseases in nearly every organ system.
- IR offers a minimally invasive (requiring minimal damage to body tissues) surgical alternative.
- It involves making small holes, usually in the groin, wrist or abdomen and using needles or catheters to treat various conditions.
- IR can be used to remove a blood clot in the brain and other arteries. It helps stop severe, life-threatening bleeding, and drain pus collections.
- Few important non-emergency treatments include- procedures to destroy cancer tumours, taking organ biopsies and open narrow or blocked arteries by placing stents etc.
- These procedures are less risky, less painful and more cost-effective than the traditional surgeries and in many cases, even hospitalisation is not required.

### Diseases treated: -

**Brain Stroke**

**Limb Attack** – Blockage in arteries of legs

**Benign Prostate Enlargement** - Prostatic Artery Embolisation can be done in some cases of prostate diseases.

**Osteoarthritis** – Knee pain

### **Who is at risk?**

**Brain Stroke:** Hypertension, smoking, stressful lifestyle, type II diabetes.

**Prostatic Embolisation:** Family history, smoking, obesity, men aged above 40 years etc.

**Osteoarthritis:** Joint injury, obesity, increased stress on joints, women aged above 45.

### **Recommendations**

Brain stroke or blockage in arteries of the leg are emergency conditions that warrant urgent consultation and hospitalisation. Patients with prostate problems or knee osteoarthritis can initially be managed with medicines however, if complaints persist IR offers nonsurgical alternatives.

### **Another set of diseases treated by Interventional Radiology-**

Varicose Veins

Uterine Fibroids

Breast Fibroadenomas – Benign Breast Tumours

Benign Thyroid Nodule

### **Recommendations-**

Each of these mentioned conditions commonly affect women and are often neglected till the condition becomes worrisome. Interventional radiology offers minimally invasive, organ preserving and nonsurgical alternatives for all these conditions. Patients can avoid prolonged hospitalisation, prolonged bed rest and resume their work within 24 hours in most cases.

### **Precautions after IR Treatment-**

**Varicose Veins:** Avoid lifting weights, regularly wear stockings for two weeks, and avoid prolonged sitting.

**Uterine Fibroids:** Avoid lifting weights for 1 week and rest for 2-3 days. The pain can be mild to moderate but can be managed through medication.

**Breast Fibroadenomas:** Compression dressing for 24 hours, follow-up for ultrasound and dressing.

**How to prevent vascular diseases** - A healthy balanced diet, regular exercise, keep blood sugar, blood pressure and cholesterol in control, avoid alcohol, quit tobacco and stress management can help prevent any kind of vascular diseases in the body.

With Warm Regards,

Medical Team, DPS – Ahmedabad.