Cervical Artificial Disc or Total Disc Replacement (TDR)

- This is an alternative for neck fusion (anterior cervical discectomy and fusion or ACDF)
- There is a large body of literature suggesting the risk of adjacent level disease ("wearing out of the discs above or below the replaced disc") is less when compared with fusion surgery, hence reduced chance of needing further surgery.
- **<u>TDR</u>** is suitable for younger patients with limited or minimal arthritis affecting the neck joints.
- The aim in this procedure is to remove the pressure on the cervical nerves caused by disc herniation or bony spur.
- This procedure is performed through a minimal access horizontal incision in front of the neck followed by removal of the disc between the vertebrae (neck bones) and replacing this with an artificial mechanical disc (see diagram below).
- There are many artificial discs produced by different device companies. Dr. Kohan commonly uses M6 device (see diagram). Biomechanical tests has shown that this device provides the closest biomechanical motions to the normal functioning disc.
- The indications and pros and cons of this procedure is discussed with patients in details by Dr. Kohan if this deemed to be appropriate alternative.





