



## **Dr. S K RAJAN**

MBBS

MS, Surgery (PGI,Chd),

MCh, Neurosurgery (GBPH,Del)

Advanced Spine Surgery Fellowships (UK,USA,IND)

***Head of Spine Surgery***

**&**

***Associate Director, Neurosurgery***

Artermis-Agrim Institute of Neurosciences

Artemis Hospital

Gurgaon

India

ARTEMIS<sup>TM</sup>  
H O S P I T A L S

## **PROFILE**

- ***Currently working as Head of Spine Surgery and Associate Director, Neurosurgery at the Artemis-Agrim Institute of Neurosciences, Artemis Hospital in Gurgaon city of Delhi-NCR, India.***
- *Prior to this, worked as Consultant Neurosurgeon & Assistant Professor at the Department of Neurosurgery, VM Medical College & associated Safdarjung Hospital, New Delhi and as Chief Spine Surgeon & Head of Department at Maharaja Agrasen Hospital, New Delhi.*
- *Accomplished surgical training from Premier Institutes of the country like PGI, Chandigarh and GB Pant Hospital, New Delhi.*
- *Underwent a number of Advanced Fellowships with National and International (USA & UK) surgeons who are international leaders in their own right so as to 'crack the code'*
- *Been invited faculty as chairperson or invited speaker to deliver talks on various topics at National level meetings held under the aiges of NSI, NSSF I & ASSI.*
- *Have authored and co-authored a number of publications – both articles in national-international journals as well as book chapters.*

***Combination of International and National Fellowship training clubbed with Faculty position at busy Central Government Institute and a busy trust based hospital has drastically cut down the 'Learning Curve', enabling successful performance of complex surgeries at a much earlier stage of practice compared to many more years of time taken by most general Neurosurgeons.***

## **PRESENT POSITION**

**Head of Spine Surgery  
& Associate Director  
Neurosurgery**

**Aug 16' till date**

**Artemis-Agrim Institute of Neurosciences  
Artemis Hospital, Gurgaon,  
Delhi-NCR, India**

## **QUALIFICATIONS**

**MCh (Neurosurgery)**

2007

Maulana Azad Medical College &  
GB Pant Hospital, New Delhi, India

**MS (General Surgery)**

2002

Post Graduate Institute of Medical  
Education & Research, Chandigarh, India

**MBBS**

1999

Government Medical College and  
Hospital, Patiala, India

## **PREVIOUS POSITIONS**

**Asst. Professor  
& Cons. Neurosurgeon**

Nov 09' to Jan 12'

Department of Neurosurgery  
VM Med. Coll. & Safdarjung Hosp, ND

**Chief Spine Surgeon &  
Head of Department**

Jan 12' to July 16'

Maharaja Agrasen Hospital  
Punjabi Bagh, ND

## **PAST POSITIONS**

**Spine Fellow**

Aug 09' to Oct 09'

Cleveland Clinic Spine Institute  
Cleveland (USA)

**Spine Fellow**

Jan 09' to Mar 09'

Dr. Goel-Dr. Laheri Spine Fellowship  
KEM Hospital, Mumbai (India)

**Spine Fellow**

Aug 08' to Oct 08'

Dr. Ramani Spine Fellowship  
Lilavati Hospital, Mumbai (India)

**Spine Fellow**

Oct 07' to Mar 08'

University College London, (UCL)  
Hospitals, London (UK)\*

**Sr Research Asso.**

Nov 07' to July 09'

Department of Neurosurgery,  
GB Pant Hospital, New Delhi (India)

**Senior Resident**

Aug 04' to Oct 07'

Department of Neurosurgery,  
GB Pant Hospital, New Delhi (India)

**Senior Resident**

Jan 03' to Mar 04'

Department of General Surgery,  
PGIMER, Chandigarh (India).

**Junior Resident**

Aug 99' to Dec 02'

Department of General Surgery,  
PGIMER, Chandigarh (India)

*\*National Hospital for Neurology & Neurosurgery, Queen's Square, London  
Royal National Orthopaedic Hospital, Stanmore, London*

## **PROFESSIONAL WORK EXPERIENCE**

- **As Head of Spine Surgery & Associate Director, Neurosurgery, Artemis Hospital**

*Artemis Hospital is a premier chain of hospitals with international accreditations and a unmatched reputation in this part of the world. Its' Neurosciences Institute is run by a highly qualified and experienced team of Neuro-Specialists and boasts of state of the art equipment and setup to help provide outstanding results.*

Accomplishments in this capacity include:

- Started 'Integrated Spine Clinic' at the hospital which now caters to patients with a wide range of problems pertaining to the Spine.

- **As Chief Spine Surgeon & Head of Neurosurgery, Maharaja Agrasen Hospital, ND**

*Maharaja Agrasen Hospital is a 400 bedded multi super-speciality hospital situated in the Punjabi Bagh region of ND(W). It has recently completed 25 years of service & is renowned especially for its critical care facilities. It has a nearly 100 bedded ICU facility with nearly one-fifth dedicated to Neuro patients. The department currently has a total of 4 Neurosurgeons.*

Accomplishments in this capacity include:

- Started dedicated Spine Clinic at the hospital which now caters to patients with a wide range of problems pertaining to the Spine.
- Performed amongst the first Artificial Disc & Dynamic lumbar implant placements and minimally invasive spinal tumor surgeries (MISS) in the region.
- Increased the number of spine surgeries being performed at the hospital by more than 3 folds year-on-year.

- **As Assistant Professor & Consultant Neurosurgeon, VMMC & SJH, ND**

*Established about 4 decades ago, the department of Neurosurgery at Safdarjung hospital has gradually grown over the years, to currently being an over 30 bedded facility with 6 bed Neuro ICU, 2 dedicated Neuro ORs & high end operating microscopes, both cranial and spinal endoscopes and 'Brain Lab' Neuronavigation equipment.*

Accomplishments at this hospital include:

- Honed my expertise in both the conventional and endoscopic/minimally invasive aspects of Neurosurgery.
- Performed procedures ranging from a variety of approaches (to the interiors of the brain and spine) to endoscopic surgeries with encouraging results.
- Presented a number of scientific articles and academic lectures at various National level conferences which have been appreciated by senior national faculty.

Working at a state run hospital and medical college provided ample opportunities to give further practical shape to the principles of Neurosurgery learnt during my fellowships.

## **PROFESSIONAL WORK EXPERIENCE (...Contd)**

### ***As Spine Fellow, Cleveland Clinic Spine Institute, Cleveland, USA***

The *Cleveland Clinic* training program for international visiting surgeons comprises of exposure to the academics and surgical management of a wide variety of Neurological disorders. It's Spine division is headed by Dr. Ed Benzel, a world authority in Spine surgery and has authored a number of books on Neurosurgery. The Prof. Benzel has mentored many leading Neurosurgeons of the world.

### ***As Spine Fellow, Queen's square & Stanmore Hospitals, London, UK***

*University College of London's (UCL)* faculty of Medicine has a number of teaching hospitals affiliated to it, each offering a unique exposure to Neurosurgery: The *National Hospital for Neurology and Neurosurgery*, Queen's square is a national and European referral centre for 'neurosurgical' disorders of the spine and constitutes the base for neurosurgery trainees seeking to train as fellows. *Royal National Orthopaedic Hospital* at Stanmore is an advanced centre excelling in the management of spinal deformities amongst others. Exposure at this hospital is central to trainees seeking to train in orthopaedic handling of spinal disorders.

### ***As Spine Fellow, Lilavati Hospital & RC, Mumbai, India***

Dr. PS Ramani is arguably the *Father of Indian Neuro-spinal surgery* with many books authored by him. *Dr Ramani's Fellowship* is a prestigious program providing exposure to neuro related problems pertinent to Indian population.

### ***As Spine Fellow, KEM Hospital, Mumbai, India***

Dr. Atul Goel is the *undisputed international authority* in craniocervical junction anomalies and Dr. Laheri is considered as the '*Dronacharya*' of *orthopaedic spine surgery training*. *Their combined fellowship* offers unique perspectives in both Neurosurgical and Orthopaedic spine surgery.

### ***As Senior Resident, Neurosurgery, GB Pant Hospital, New Delhi, India***

***Govind Ballabh Pant Hospital*** is a renowned super-specialty teaching hospital in New Delhi. It is *equipped with the latest operating microscopes (Opmi Pentero, NC4)* for micro-neurosurgery, *Image intensifiers to assist spine surgeries*, and dedicated *Endoscopes for Minimally Invasive Cranial and Spinal Surgery (Metrix/Karl Zeiss)*. The department is the only centre in the country where neurosurgery trainees are provided training in neuroangiographic procedures along with exposure to Endovascular Procedures like lesion embolisation, aneurysm coiling, etc. Over 1200 major and 2000 minor procedures are carried out in the department each year.

## PRESENTATIONS AND PUBLICATIONS

### 1. Presentations In Scientific Meetings (*National Level Only*)

- 2015  
**Decision Making in Multi Segmental Cervical Spondylosis (MSCS)**  
Invited Talk at the Ann. Conf. of Neuro-Spine Surgeons Association (NSSA) of India at Goa, India
- 2013  
**Relevance of Regional Anatomy in treatment of CVJ Anomalies**  
Invited Talk at the Ann. Conf. of the Neurological Society of India (NSI) at New Delhi, India
- 2012  
**Management Principles in the Treatment of Bony Spinal Tumors**  
Invited Talk at the Ann. Conf. of Neurological Surgeons Society of India (NSSI) at New Delhi, India
- 2011  
**Endoport Excision of Spinal Tumors using principles of minimally invasive spine surgery**  
Invited Talk at the Ann. Conf. of Neuro-Spine Surgeons Association (NSSA) of India at Bangalore, India
- 2010  
**Correction of Fixed irreducible CVJ anomalies by 'Posterior Only' approach**  
Invited Talk at the Annual Conference of the Neurological Society of India (NSI) at Jaipur, India
- 2008  
**Decision making in cervical spondylosis – an analysis of 119 patients**  
Invited Talk at the Ann. Conf. of the Neuro Spinal Surgeons Foundation of India (NSSFI) at Rajkot, India
- 2007  
**'The Non Secretory Pituitary Adenomas – Is the nomenclature justified?'**  
Podium presentation at the Ann. Conf. of the Neurological Society of India (NSI) at Madurai, India
- 2006  
**'Intractable Hiccups caused by brainstem compressive lesion: A Case Study'**  
Podium Presentation at the Delhi Neurological Association Conference (DNA), New Delhi, India
- 2005  
**'Surgical strategies for ossified posterior longitudinal ligament of cervical spine'**  
Podium presentation at the Ann. Conf. of the Neurological Society of India (NSI) at Vizag, India

### 2. Publications

#### **PUBLISHED**

- 2010
  - **'Interspinous Spacers – State of the Evidence'**  
Rajan S, Casey A, Choi D (Review Article), Department of Neurosurgery, National Hospital for Neurology Neurosurgery, London
  - **'Utility of SPECT in patients with severe head injury'**  
Dhandapani SS, Rajan S, Sharma KC, Department of Neurosurgery, Safdarjung Hospital & VM Medical College, New Delhi
- 2009
  - **'Craniovertebral Instability Secondary to Degenerative Osteoarthritis of the Atlanto-Axial Joints: Analysis of Management of 108 Cases.'** Goel A, Shah A, Rajan S, Clinical Series. (International) Journal of Neurosurgery – Spine. 2009
  - **'Vertical Reducible Atlantoaxial Dislocation – A new entity.'** Goel A, Shah A, Rajan S, Clinical Series. (International) Journal of Neurosurgery – Spine. 2009
- 2008
  - **'Tethered Cord Syndrome – A Review'**  
Sharma A. RajanS, Bindra G. Review of Literature. Department of Neurosurgery, GB Pant Hospital, New Delhi. North East Journal of Neurosciences.7:112-5. 2007
  - **'Crowned Dens Syndrome'**  
Rajan S. Chapter in Goel ATH: Craniovertebral Junction Anomalies. Thieme Publications. (In press)

## **PRESENTATIONS AND PUBLICATIONS (...contd.)**

**2007**

***'The Histopathological and Immunohistochemical analysis of Pituitary adenomas and their correlation with Clinical and Hormonal Findings.'***

Rajan S, Sharma A, Srivastava AK, Tatke M. J of Faculty of Medical Sciences, Delhi University, New Delhi. Published Mar, 2007

**2002**

***'Intracranial Pressure and Cerebral Perfusion Pressure monitoring in patients with Diffuse Axonal Injury'.***

Rajan S, Khosla VK, Post Graduate Institute of Medical Education and Research Bulletin, Chandigarh. Published Dec, 2002

### ***SUBMITTED - UNDER REVIEW***

- ***'Fatal Epistaxis from the fetal posterior communicating artery - A delayed complication of Trans-sphenoidal Surgery'***

Jagetia A, Rajan S, Sinha S. (Case Report and Review of Literature), submitted to Acta Neurochirurgica (under Review)

- ***'Angiographic extravasation of contrast medium resembling hematoma'***

Jagetia A, Rajan S, Sinha S. (Case Report), submitted to Journal Of Clinical Neurosciences (Under Review)

- ***'Epidural Migration of a Sequestered Lumbar Disc Fragment masquerading as a Nerve Sheath Tumor - Case report and review of literature'***

Rajan S, Sandeep S, Srivastava AK. (Case Report and Review of Literature), submitted to the European Spine Journal (under Review)

### ***UNDER PREPARATION***

- ***'Parosteal Osteosarcoma of the Spine – A New Lesion'***

Rajan S (Case Report), Department of Neurosurgery, Maharaja Agrasen Hospital, New Delhi

- ***'Masson's Tumor of the Axis'***

Rajan S (Case Report), Department of Neurosurgery, Maharaja Agrasen Hospital, New Delhi

## **MANAGEMENT & ORGANISATIONAL SKILLS**

I have been regularly involved in managing work at the hospital at administrative level including the procurement of equipment, managing the team under my domain, etc

I have been at the forefront in *organizing conferences* of varying magnitudes. I was the team leader of the committees for organizing registration and scientific programs.

## **INVITED LECURES AND FACULTY**

***I have been regularly been invited as faculty to various local and national level conferences including the position of chairperson, invited speaker and expert panel member.***

## **CONTINUED PROFESSIONAL DEVELOPMENT**

### **1. Participation In Scientific Meetings (*abbreviated list*)**

#### **2015**

- 'Spine 2015' Annual Conference of the Neuro-Spinal Surgeons Association of India., Goa, India

#### **2014**

- 1<sup>st</sup> World Congress on Minimally Invasive Neurosurgery, Florence, Italy
- 26<sup>th</sup> Annual Conference of the Association of Spine Surgeons of India. New Delhi, India

#### **2013**

- 1<sup>st</sup> World Congress on Minimally Invasive Neurosurgery, Florence, Italy
- 50<sup>rd</sup> Annual Conference of the Neurological Society of India, Gurgaon

#### **2012**

- 1<sup>st</sup> World Congress on Minimally Invasive Neurosurgery, Florence, Italy
- 26<sup>th</sup> Annual Conference of the Association of Spine Surgeons of India. New Delhi, India

#### **2011**

- 4<sup>th</sup> Annual Dubai Spine Masters Congress, Dubai, UAE
- 25<sup>th</sup> Annual Conference of the Association of Spine Surgeons of India. Mumbai, India
- 'Spine 2011' Annual Conference of the Neuro-Spinal Surgeons Association of India., Bangalore, India

#### **2010**

- Instructional Course in Spine (Joint event of ASSI & Spinal Society. of Europe), Mysore
- 11<sup>th</sup> Annual Conference of the Neuro-Spinal Surgeons Foundation of India. Indore
- 59<sup>th</sup> Annual Conference of the Neurological Society of India, Jaipur

#### **2009**

- 23<sup>th</sup> Annual Conference of the Association of Spine Surgeons of India. Chennai, India
- Ganga Operative Spine Course, Coimbatore, India
- XIV WFNS World Congress of Neurological Surgery, Boston, USA

#### **2008**

- 9<sup>th</sup> Annual Conference of the Neuro-Spinal Surgeons Foundation of India. Rajkot
- Conference on Orthopaedic Implant Biomechanics, New Delhi
- 22<sup>nd</sup> Annual Conference of the Association of Spinal Surgeons of India. Chennai

#### **2007**

- 7<sup>th</sup> Annual Conference of the Delhi Neurological Association, New Delhi
- 7<sup>th</sup> International Workshop on Nerve Muscle Disorders, New Delhi
- 4th South Asian Neurosurgical Congress, New Delhi
- Instructional Course in Spine (Joint event of ASSI & Spinal Society. of Europe), Goa
- 2<sup>nd</sup> International Conference on Spinal Deformities, New Delhi

#### **2006**

- 6<sup>th</sup> Annual Conference of the Delhi Neurological Association, New Delhi
- 2<sup>nd</sup> Dr. Bham Prakash Memorial Oration, New Delhi
- 56<sup>th</sup> Annual Conference of Neurotrauma Society of India, New Delhi
- 55<sup>th</sup> Annual Conference of the Neurological Society of India, Madurai

#### **2005**

- 1<sup>st</sup> Dr. Bham Prakash Memorial Oration, New Delhi
- 3<sup>rd</sup> Craniospinal Traumacon, Noida
- 5<sup>th</sup> International Clinic of Neurological Surgery, Noida
- 54<sup>th</sup> Annual Conference of the Neurological Society of India, Vishakapatnam



## **2. Regular Enhancement of Skills by Attending Workshops (*abbreviated list*)**

- *Cadaveric workshop on Minimally Invasive Spine Surgery, Bangalore, 2012*
- *AO Spine Advanced Spine Course, New Delhi, 2010*
- *AO Spine Principles Spine Course, New Delhi, 2009*
- *Hands-on Cadaveric Workshop on Spinal Instrumentation, Rajkot, 2008*
- *Anterior Cervical and Lumbosacral Stabilisation - Hands-on Workshop, Goa, 2007*
- *Minimally Invasive Lumbar Instrumentation - Hands-on Workshop, Goa, 2007*
- *Workshop on Presentation Skills, British Council, New Delhi, 2007*
- *Advanced Microneurosurgery Workshop, Ethicon Inst. of Surgical Education, New Delhi, 2006*
- *Microneurosurgery Workshop, Ethicon Institute of Surgical Education, New Delhi, 2005*

