Editorial

This newsletter presents you various events at Aravind and active contribution of Aravindites at different levels. The 10th memorial day of our Founder Chairman was observed in a solemn manner at all Aravind facilities. The second course of the Art of Living programme was also found it to be a very effective one. The Pegasus experience was a rejuvenating one for the Aurolab staff who participated in it.

The child care centre, moved from the third floor in the main building to the third floor at LAICO with availability of the large and airy space, made both the staff and children very happy. And all those children who have been waiting for this move have started joining the creche, as one child per week.

Prof. K. Dharmalingam brought laurels to Aravind Eye Care System by receiving Bireshwar Chakrabarti Oration Award 2016. Many presented their posters and received best poster award in IERG conducted in Hyderabad.

Have an interesting experience reading this newsletter.

News about these and many more feature in this issue.

NEWS AND EVENTS

Vision Day

Aravind, July 07, 2016

Aravind Madurai, Coimbatore, Tirunelveli, Aravind - Pondicherry organized vision day programmes on the Tenth memorial day of our Founder and Chief Dr. G. Venkataswamy. The hospital staff in Madurai, Tirunelveli & Coimbatore
joined together in the vision day programme of Madurai through Video Conference. In this programme, Dr.Lalji Vora and Mr.Rajagopal shared their memories about Dr.V. M.Os, M.Cs, staff, Fellows, MLOPs and the children of our staff attended this meeting. They expressed that how they are influenced by Dr. V and sang bhajans. A video was prepared about our staff’s experience and sharing about our founder and played in this meeting. Staff paid homage to the beloved founder by observing a moment of silence. Video presentation showing the life history of Dr.V was screened in Pondicherry also. Dr. R. Venkatesh, Chief Medical Officer, Dr. K. Veena, Chief of Paediatric Department, Mr.Poobalan, Manager-Administration, Mrs. Subbulakshmi, Asst. Nursing Superintendent, Dr. Meena Thotakura – shared their experiences at Aravind and thoughts about the Chief. There was a Bhajan performance by the staff. Special flower arrangement was made in the meditation room.

A competition on Dr.G.V Sir’s life history from Vizhivelvi book was conducted for the newly recruited sisters and prizes were distributed.

**Art of Living Programme**

Aravind Madurai, 04 – 09, 2016

"Art of living” Happiness programme was arranged for Aravind Eye Hospital, Madurai staff members. The one week programme was handled by Guruji. Mr. Dhanapal who is personally trained by Sri Sri Ravishankarji from Vyaki Vikas Kendra. Twenty members joined and benefitted. Due to the interest shown by the staff, again one more week’s programme was organized with the same Guruji and thirteen members joined and benefitted.

**LCI II president visit**

LAICO 23rd July 2016

Ms.Gudrun Bjort Yngvadottir, II vice president of Lions club international and her husband Mr. Dr. Jon Bjarni Thorsteinsson visited LAICO at 6pm. on 23rd July. Administrator Mr.Gopala Krishna Raja began the gathering with his welcoming speech. Progressively Ms.Sashi, senior faculty- LAICO presented Aravind’s genesis and Lion’s contribution to Aravind and LAICO activities. Executive Director Mr.Thulasiraj, LAICO and Mr. Aravind, Administrator of AECS addressed the meeting with their inspiring talks. Ms. Gudrun Bjort Yngvadottir gave on oration on LIONs generous activities. Mr. Arivazhagan, Governor of Lions Club 324 B3 rendered a speech on the club’s activities in which he included about the Lions contribution in Aravind’s growth. At the closure a press meet was conducted.

**Review visits and onsite meeting**

Dubai, July 9 – 10, 2016

A team from LAICO made the follow up visits to various hospitals for HCI project in Kenya, Zambia, Nigeria and Ethiopia in Africa. This team consisted of Ms. Sashi, (Dr. Fitsum Birhan Specialized Eye Clinics, Mekele, Ethiopia) Mr.
Gowth, (Innovation Eye Center, Kisii, Kenya), Mr. Suresh, (City Eye Hospital, Nairobi, Kenya), Mr. Ganesh Babu,(Eye Foundation, Ijebu, Nigeria) and Ms. Dhivya, (Kitwe Central Hospital Community Eye Service, Kitwe, Zambia).

As a follow up they attended the HCI review meeting on 9th & 10th July at Hotel Four point, Dubai. Dr. R.D. Ravindran, Chairman -AECS, Mr.R.D.Thulasiraj, Executive Director- LAICO honoured this meeting. Additionally Mr.Alfred Sommer Dean Emeritus of the Bloomberg School of Public Health and Professor at the Wilmer Institute at John Hopkins University, with his team from US and Mr.Shaheen with Mr.Robert also attended this meeting.

### Diabetic Retinopathy Screening Camps

Aravind Madurai, July 9, 2016

Vision centre of Singampunari organised a Diabetic Outreach Camp in a village called Kampur. Mr. Kumar, Field Co-ordinator made all the arrangements. Youth wing of Kampur union gave enormous support by bringing the people to the camps. Eye screening was done for 245 persons of which 73 were diabetics. Among them 67 were diagnosed to be affected by cataract and retina problems, and referred to the Base Hospitals. Twenty five persons were found to be diabetics, for the first time.

At the DR Screening Camp conducted at Thiruppuvanam 173 patients were screened, of which 73 were diabetic patients. Of these, 26 were newly diagnosed. Among known diabetics, one is a DR patient and 7 were newly diagnosed. 33 patients had cataract problems and were referred to Thiruppuvanam Vision Center. Planning and proper arrangements were done by Mr. J.Rajapandian, the eye health coordinator, with the involvement of youth from the Nadar Uravinmurai and the others from the village who contributed to the success of the camp.

**July 28th, 2016**

Diabetic Retinopathy screening camps were conducted in Chokkalingapuram at Singampuneri and Alanganallur, by the Eye health coordinators Mr.Kumar and Mr. P. Sathesh, respectively. Out of 215 OP, screened in Chokkalingapuram, 51 were diabetic patients. Of those 51, 24 were newly diagnosed. New Diabetic Retinopathy patients were two. 39 patients had cataract problem and they were referred to Singampuneri Vision Center. The sponsor was Lions Club of Singampuneri.

Out of 273 out-patients screened in Alanganallur, 111 were diabetic patients. Of those 111 patients, 19 were newly diagnosed. Known diabetic retinopathy patients were four. 55 patients had cataract problem. They were referred to Alanganallur Vision Center. Sponsors of this camp were Mr.Annamalai and Mr. Malai Selvam.

### Awareness Programme

General public and 145 school students attended the Awareness Programme conducted in Piramelur at Thiruppuvanam Vision Centre where common eye disorders, their prevention and cure were explained to them.

### Government and Government aided school Awareness Programme

Aravind-Tirunelveli, 29th July, 2016
An awareness Programme was conducted for Government and Government aided school Head Masters/ Head mistresses at Tirunelveli. Mr.R.Swaminathan, CEO was the chief guest of this Awareness Programme. About 160 Head masters/ Head mistresses participated in the function.

Mr.R.Swaminathan, CEO at Tirunelveli spoke about the yeomen service rendered by Aravind Institution to the society and the role of the HM in helping the school children to get better vision. Dr.R.MeenaKshi, Chief Paediatric Clinic in her talk, emphasized the importance of detecting eye problems in children at the earliest. Dr.Fathima spoke on "Common Eye Diseases". At the closure few Head masters shared their experience and their learning in attending this Awareness Programme.

**Inspired Leadership through Personal Mastery Programme**

Aravind – Madurai July 15, 2016

The six modules long ‘Inspired Leadership through Personal Mastery’ Programme was started at Aravind Madurai. The first module was conducted by Dr. Thimappa Hegde, Neurosurgeon, Narayana Hrudayalaya. Other 5 modules will be conducted by Prof. DVR Seshadri, (Indian School of Business, Hyderabad) and will be spread over next 5 months. Dr. Kim and Dr. Devendra are anchoring this initiative. As part of these Programme 26 participants from AEH Madurai, LAICO and Aurolab which includes doctors, managers, administrators, LAICO Faculty were brought together.

The essence of Programme is that when we grow higher in organization, while people look up to us, they follow our actions; hence, it is imperative that to lead we must master ourselves. This 6 module Programme will concentrate on developing leadership through self/personal mastery.

**Janakiamma Childcare Centre Inauguration- LAICO**

LAICO- Madurai, 20th July, 2016

Janakiamma Childcare Centre was moved to a new and spacious premises at LAICO 3rd floor. Our honorable Director-Emeritus Dr. G. Natchiar inaugurated the new facility. The management members, Senior Staffs, Parents and the Creche’s children participated in this ceremony.
CONFERENCE ATTENDED ELSEWHERE

Ophthalquest 2016 (Cataract & Refractive Surgery)
New Delhi, July 16 - 17, 2016

Dr. P. Vijayalakshmi

23rd Annual Meeting of Indian Eye Research Group (IERG) – ARVO India Chapter
LV Prasad Eye Institute, Hyderabad, July 30-31

Three faculty members and twelve research scholars from Aravind Medical Research Foundation participated and presented their work. Prof. K. Dharmalingam received “Bireshwar Chakrabarti Oration Award 2016” from Dr. G. N. Rao, LVPEI. He gave a talk on “Proteomics of eye diseases”. He also conducted an hour long session on Back to Basics on the topics “Proteomics for Clinicians”. Ms. A. Divya from proteomics department received the best poster award (Basic Science Category).

Ms. Yogapriya - Immunology & Stem cell biology, Ms. A. Divya - Proteomics, Mr. Mohammad. Razeeth - Proteomics, Mr. Balaji - Molecular genetics and Ms. Y. Madhavi Latha Yelchuri - Ocular Pharmacology received travel fellowship and attended the meeting.

Poster Presentations

Dr. Gowripriya
- Molecular signature of highly enriched corneal epithelial stem cells

Dr. S. Senthil Kumari
- Attenuation of Lipofuscin bisretinoids (A2E) accumulation by macular carotenoids in Human Retinal pigment epithelial cells in vitro

Aswin Balaji
- Effects of SB772077B on rock expression in human trabecular meshwork cells

**T.S.Balaji**
- Assessing the role of RB1 mutations in chemoresistance of retinoblastoma

**A.Divya**
- Aspergillus flavus infection induced changes in the proteome of human corneal epithelial cell line

**K.Kathirvel**
- Comparative genome analysis to identify genomic variants and genes associated with drug resistance in ocular Pseudomonas aeruginosa isolates

**K.Lavanya**
- Micro-RNA profiling of enriched corneal epithelial stem cells

**Madhavi Latha Yelchuri**
- Investigating the relationship between central macular pigment optical density (MPOD) and plasma carotenoids in Indian population

**K.Manoj Kumar**
- Comparison of variant calling pipelines for SNVs and InDels in exome data of normal and patient with eye disease

**Mohammad Hussain**
- Identification of SIX6 gene variants in Indian primary open angle glaucoma patients

**S.Mohammad Razeeth**
- Effect of alkaline protease deletion in Aspergillus flavus

**KRP.Niranjana**
- Zinc alpha-2 glycoprotein regulation in Aspergillus flavus keratitis

**Sandhya Krishnan**
- Understanding the role of complement regulatory protein factor H in tear fluid of mycotic keratitis patients

**S.Yogapriya**
- Structural and functional integrity of corneal endothelium after storage in cornisol, an indigenous intermediate term corneal storage medium

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**7th Update on Neuro-Ophthalmology (UNO-2016)**

Aravind – Coimbatore, July 30-31, 2016
A Pre-Conference Dry Lab was held at the hospital premises on the 29th of July, which attracted more than 180 doctors. This Workshop included Interactive Sessions at various Stations, Finally Interesting Case Discussions with audience polls.

The Update was held at Jenney’s Club; inaugurated by Director - Emeritus, Dr.G.Natchiar, National and International Faculty shared their expertise.

The Quiz was conducted by our Quizmaster Dr. D.Chandrasekhar, and Dr. Siddharth.

We had 29 teams enrolled for the preliminary round and 5 teams made it to the final round. The JAM session also had quite a good response with 14 keen participants.

The UNO-2016 was a tremendous success with 330 registrations.

**LAICO HAPPENINGS**

**National Eye Health Summit 2016**


Mr. R.D. Thulasiraj, Executive Director, started his trip with a talk at the US National Eye Health summit 2016, organised by Prevent blindness at Washington DC. The meeting focused on eye health for the US and he shared the Indian experience in significantly increasing the cataract surgical volume in the country as well as the challenges that still remain. Thereafter, for the next three days he was at Johns Hopkins, Baltimore, to firm up continuing collaboration with several of the faculty. Subsequently he met with Prof. Sachin Gupta at Cornell University, Ithaca regarding the current and potential future studies. The last two days of the trip was at New York wherein he met with Warby Parker, Orbis and other supporters of Aravind. Dr. Christine Melton, President of Aravind Eye Foundation had organized a reception and a surprise celebration of 40th year of Aravind Eye Hospital, which was attended by several friends of Aravind.
Enrolments for July 2016 at Aravind Eye Care System

<table>
<thead>
<tr>
<th>Course title</th>
<th>Training Centre</th>
<th>Enrolments for July 2016</th>
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<tr>
<td><strong>Long Term Fellowship Programmes - For Ophthalmologists</strong></td>
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<tr>
<td>General Ophthalmology</td>
<td>Salem</td>
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<tr>
<td>Glaucoma</td>
<td>Coimbatore</td>
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<tr>
<td>Retina Vitreous</td>
<td>Madurai</td>
<td>5</td>
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<td></td>
<td>Tirunelveli</td>
<td>3</td>
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<tr>
<td><strong>Paediatric Ophthalmology &amp; Strabismus</strong></td>
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<tr>
<td></td>
<td>Pondicherry</td>
<td>1</td>
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<tr>
<td></td>
<td>Madurai</td>
<td>1</td>
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<tr>
<td><strong>Short Term Courses - For Ophthalmologists</strong></td>
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<tr>
<td>Neuro Ophthalmology</td>
<td>Madurai</td>
<td>1</td>
</tr>
<tr>
<td>Management of Retinopathy of Prematurity and Paediatric Retinal Disorders</td>
<td>Coimbatore</td>
<td>1</td>
</tr>
<tr>
<td>Clinical Observership Program In Diagnosis and Management Of Glaucoma</td>
<td>Coimbatore</td>
<td>2</td>
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<tr>
<td></td>
<td>Tirunelveli</td>
<td>1</td>
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<td>Phacoemulsification</td>
<td>Pondicherry</td>
<td>2</td>
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<tr>
<td></td>
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<td>1</td>
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<tr>
<td></td>
<td>Coimbatore</td>
<td>2</td>
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<tr>
<td>Small Incision Cataract Surgery</td>
<td>Coimbatore</td>
<td>1</td>
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<td>Lasers in Diabetic Retinopathy</td>
<td>Madurai</td>
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<tr>
<td></td>
<td>Coimbatore</td>
<td>2</td>
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<tr>
<td></td>
<td>Pondicherry</td>
<td>1</td>
</tr>
<tr>
<td>Training for Orthoptist</td>
<td>Madurai</td>
<td>2</td>
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PUBLICATIONS

- Venugopal A, Rathi H, Rengappa R, Ravindran M, Raman R.  
  *Outcomes after Auro Keratoprosthesis Implantation: A Low-Cost Design Based on the Boston Keratoprosthesis.*  
  Cornea. 2016 Jul 13. [Epub]  
  [Article View](#)

- Soundaram M, Sufi AR, Prajna NV, Keenan JD.  
  *Comparison of In Vivo Confocal Microscopy, Ultrasonic Pachymetry, and Scheimpflug Topography for Measuring Central Corneal Thickness.*  
  [Article View](#)

  *Spring-action Apparatus for Fixation of Eyeball (SAFE): a novel, cost-effective yet simple device for ophthalmic wet-lab training.*  
  Br J Ophthalmo. 2016 Jul 26. [Epub]  
  [Article View](#)

- Kavita Lohiya D, Manoranjan Das, Sundersan P, Prajna NV.  
  *Bilateral Atypical Granular Corneal Dystrophy Associated with Unilateral Keratoconus in a Male Child.*  

Rathi HS, Venugopal A, Rengappa R, Ravindran M. 
Scedosporium Keratitis: An Experience From a Tertiary Eye Hospital in South India. Cornea. 2016 Aug 17. [Epub]

Narendran S, Saravanan VR, Pereira M 

AUROLAB NEWS

Pegasus Training
Aurolab, July 23 - 24, 2016

Aurolab Equipment Division attended the Pegasus Training in Pondicherry. The participants felt that the training was useful and very much informative for their career. They all look very bright and rejuvenated after this training programme.

Guest Lecture on Managing Cholesterol
Aurolab July 29, 2016

A guest Lecture on Managing Cholesterol was delivered in Aurolab by Dr.Balamurugan from Vivekananda Hospital. In this session he detailed the types of cholesterol with its risk factors and suggested the healthy eating habits and proper exercises. He insisted on Controlling the Cholesterol. Human Resource department facilitated this programme.

Vision day

Vision day the 10th memorial day of our beloved chief Dr.V was observed in Aurolab. The meeting began with the prayer song, and all the staff paid homage to the beloved chief by observing 2 minutes moment of silence. A video by the name “A Man of the Million” was screened. Mr. Raja Govindasamy – Director Mannar Thirumalai Naickar College was invited as Chief Guest, to share his great experiences with Dr.V. The prayer meeting came to an end with Aravind Anthem.
MONTHLY PATIENT STATISTICS

July - 2016

<table>
<thead>
<tr>
<th>Hospitals</th>
<th>Madurai</th>
<th>Theni</th>
<th>Tirunelveli</th>
<th>Coimbatore</th>
<th>Pondicherry</th>
<th>Dindigul</th>
<th>Tirupur</th>
<th>Salem</th>
<th>Udumalpet</th>
<th>Tuticorin</th>
<th>Total</th>
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<tbody>
<tr>
<td><strong>HOSPITAL OUT-PATIENT VISITS</strong></td>
<td></td>
<td></td>
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<td>Paying (New &amp; Review)</td>
<td>59,913</td>
<td>7,909</td>
<td>29,548</td>
<td>37,283</td>
<td>28,705</td>
<td>6,700</td>
<td>4,565</td>
<td>12,351</td>
<td>2,996</td>
<td>5,378</td>
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<td>Free (Direct walk-in)</td>
<td>17,488</td>
<td>1,653</td>
<td>7,253</td>
<td>11,077</td>
<td>9,774</td>
<td>14</td>
<td>731</td>
<td>761</td>
<td>1,028</td>
<td>765</td>
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<td><strong>OUTREACH OUT PATIENTS</strong></td>
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<td>Regular Eye Camps</td>
<td>11,354</td>
<td>1,399</td>
<td>5000</td>
<td>10,208</td>
<td>9,153</td>
<td>NA</td>
<td>NA</td>
<td>1,342</td>
<td>NA</td>
<td>399</td>
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<td>Diabetic Retinopathy camps</td>
<td>772</td>
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<td>184</td>
<td>688</td>
<td>823</td>
<td>NA</td>
<td>NA</td>
<td>NA</td>
<td>NA</td>
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<td>Refraction Camps</td>
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<td>629</td>
<td>1,995</td>
<td>1,138</td>
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<td>Mobile Refraction Unit</td>
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<td>NA</td>
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<td>NA</td>
<td>NA</td>
<td>155</td>
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<td>School Screening camps</td>
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<td>740</td>
<td>288</td>
<td>7,429</td>
<td>8,746</td>
<td>NA</td>
<td>NA</td>
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<td>Paediatric Camps</td>
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<td>NA</td>
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<td>NA</td>
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<td>Vision Centres</td>
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<td>10,210</td>
<td>3,413</td>
<td>4,911</td>
<td>NA</td>
<td>938</td>
<td>NA</td>
<td>1,153</td>
<td>NA</td>
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<td>Community Eye Clinics</td>
<td>4,179</td>
<td>1,921</td>
<td>2,872</td>
<td>NA</td>
<td>NA</td>
<td>NA</td>
<td>NA</td>
<td>NA</td>
<td>NA</td>
<td>8,972</td>
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<td><strong>Total OP Examinations</strong></td>
<td>1,13,997</td>
<td>18,970</td>
<td>55,984</td>
<td>72,093</td>
<td>64,954</td>
<td>6,714</td>
<td>6,234</td>
<td>20,109</td>
<td>5,177</td>
<td>6,542</td>
<td>3,70,774</td>
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| **SURGERIES** |         |       |             |             |             |          |         |       |           |           |       |
| Paying | 3,970 | 455 | 1,421 | 1,622 | 1,530 | 240 | 170 | 599 | 125 | 158 | 19,608 |
| Free (Direct) | 3,950 | 250 | 927 | 1,537 | 1,303 | 103 | 106 | 126 | 143 | 78 | 18,310 |
| Camp | 3,319 | 185 | 1,180 | 2,200 | 2,212 | NA | 61 | 277 | 20 | 97 | 9,567 |
| **Total Surgeries** | 11,239 | 890 | 3,528 | 5,359 | 5,045 | 343 | 337 | 1,002 | 288 | 333 | 47,485 |

Note: NA - Not Applicable