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| **S.NO.** | **AUTHOR, TITLE, SOURCE, AUTHOR AFFILIATION, ABSTRACT** | **NAT/INT** | **MONTH** | **PMID** |
|  | Aaron S(1), Shyamkumar NK(2), Alexander S(2), Babu PS(1), Prabhakar AT(1), Moses V(2), Murthy TV(1), Alexander M(1).  Mechanical thrombectomy for acute ischemic stroke in pregnancy using the penumbra system.  Ann Indian Acad Neurol. 2016 Apr-Jun;19(2):261-3. doi: 10.4103/0972-2327.173302.  **Author information:**  (1)Department of Neurological Sciences, Christian Medical College and Hospital, Vellore, Tamil Nadu, India. (2)Department of Radiology, Christian Medical College and Hospital, Vellore, Tamil Nadu, India.  Even though intravenous thrombolysis with tissue plasminogen activator (IV tPA) is the standard of care in acute ischemic stroke, its use in pregnancy is not clearly defined. Mechanical thrombectomy devices can be an option; however, literature on the use of such mechanical devices in stroke in pregnancy is lacking. Here we describe two cases that developed acute embolic stroke during pregnancy who were successfully treated by mechanical clot retrieval using the Penumbra system 28 (Penumbra Inc., Alameda, California, USA). To the best of our knowledge, these are the only case reports on the use of the Penumbra device in pregnant patients with acute ischemic stroke. DOI: 10.4103/0972-2327.173302 | NAT | **JAN TO JUN** | **PMID:**27293343 **PMCID: PMC**4888695 |
|  | Abhilash K(1), Mannam PR(2), Rajendran K(1), John RA(2), Ramasami P(3).  Chest radiographic manifestations of scrub typhus.  J Postgrad Med. 2016 Oct-Dec;62(4):235-238. doi: 10.4103/0022-3859.184662.  **Author information:**  (1)Department of Emergency Medicine, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Radio-Diagnosis, Christian Medical College, Vellore, Tamil Nadu, India. (3)Department of Biostatistics, Christian Medical College, Vellore, Tamil Nadu, India.  BACKGROUND AND RATIONALE: Respiratory system involvement in scrub typhus is seen in 20-72% of patients. In endemic areas, good understanding and familiarity with the various radiologic findings of scrub typhus are essential in identifying pulmonary complications. MATERIALS AND METHODS: Patients admitted to a tertiary care center with scrub typhus between October 2012 and September 2013 and had a chest X ray done were included in the analysis. Details and radiographic findings were noted and factors associated with abnormal X-rays were analyzed. RESULTS: The study cohort contained 398 patients. Common presenting complaints included fever (100%), generalized myalgia (83%), headache (65%), dyspnea (54%), cough (24.3%), and altered sensorium (14%). Almost half of the patients (49.4%) had normal chest radiographs. Common radiological pulmonary abnormalities included pleural effusion (14.6%), acute respiratory distress syndrome (14%),airspace opacity (10.5%), reticulonodular opacities (10.3%), peribronchial thickening (5.8%), and pulmonary edema (2%). Cardiomegaly was noted in 3.5% of patients. Breathlessness, presence of an eschar, platelet counts of <20,000 cells/cumm, and total serum bilirubin >2 mg/dL had the highest odds of having an abnormal chest radiograph. Patients with an abnormal chest X-ray had a higher requirement of noninvasive ventilation (odds ratio [OR]: 13.98; 95% confidence interval CI: 5.89-33.16), invasive ventilation (OR: 18.07; 95% CI: 6.42-50.88), inotropes (OR: 8.76; 95% CI: 4.35-17.62), higher involvement of other organsystems, longer duration of hospital stay (3.18 ± 3 vs. 7.27 ± 5.58 days; P< 0.001), and higher mortality (OR: 4.63; 95% CI: 1.54-13.85).  CONCLUSION: Almost half of the patients with scrub typhus have abnormal chest radiographs. Chest radiography should be included as part of basic evaluation atpresentation in patients with scrub typhus, especially in those with breathlessness, eschar, jaundice, and severe thrombocytopenia.DOI: 10.4103/0022-3859.184662 | NAT | **JUL TO DEC** | **PMID:**27763480  **PMCID: PMC**5105208 |
|  | Abraham P(1).  Treatment for hepatitis C virus infection in India: Promising times.  Indian J Med Microbiol. 2016 Jul-Sep;34(3):273-4. doi: 10.4103/0255-0857.188312.  **Author information:**  (1)Department of Clinical Virology, Christian Medical College, Vellore, Tamil Nadu, India.  DOI: 10.4103/0255-0857.188312 | NAT | **JUL TO DEC** | **PMID:**27514946 |
|  | Adhikari DD(1), Florence B(2), David SS(2).  Prehospital trauma care in South India: A glance through the last 15 years.  J Family Med Prim Care. 2016 Jan-Mar;5(1):195-6. doi: 10.4103/2249-4863.184669.  **Author information:**  (1)Department of Pediatrics, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Emergency Medicine, Christian Medical College, Vellore, Tamil Nadu, India.  DOI: 10.4103/2249-4863.184669 | NAT | **JAN TO JUN** | **PMCID: PMC**4943141  **PMID:**27453878 |
|  | Agarwala MK(1), George L(1), Parmar H(2), Mathew V(3).  Ross Syndrome: A Case Report and Review of Cases from India.  Indian J Dermatol. 2016 May-Jun;61(3):348. doi: 10.4103/0019-5154.182472.  **Author information:**  (1)Department of Dermatology, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Pathology, Christian Medical College, Vellore, Tamil Nadu, India. (3)Department of Neurology, Christian Medical College, Vellore, Tamil Nadu, India.  Ross syndrome is a rare dysautonomia characterized by a clinical complex of segmental anhidrosis or hypohidrosis, areflexia, and tonic pupils. A very few cases (≃50) have been reported in literature since its original description in 1958. Here, we report the case of a middle-aged homemaker from Odisha, India, who presented with complaints of segmental hypohidrosis for the past 7 years. DOI: 10.4103/0019-5154.182472 | NAT | **JAN TO JUN** | **PMCID: PMC**4885212  **PMID:**27293279 |
|  | Agarwala MK(1), Mukhopadhyay S(2), Sekhar MR(1), Menon A(2), Peter CD(1).  Solitary Angiokeratoma Presenting as Cutaneous Horn over the Prepuce: A RareAppearance  Indian J Dermatol. 2016 Mar-Apr;61(2):236. doi: 10.4103/0019-5154.177779.  **Author information:**  (1)Department of Dermatology, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Pathology, Christian Medical College, Vellore, Tamil Nadu, India.  We present a case of a 47-year-old man with 4 months history of conical growth on the prepuce with a progressive increase in size. The patient had been treated for seminoma a decade ago. Histopathology of the growth showed features of angiokeratoma. It is unusual for angiokeratoma to masquerade as a cutaneous horn. DOI: 10.4103/0019-5154.177779 | NAT | **JAN TO JUN** | **PMCID: PMC**4817473  **PMID:**27057048 |
|  | Agarwala MK(1), Mukhopadhyay S(2), Sekhar MR(1), Peter CD(1).  Bullous Fixed Drug Eruption Probably Induced by Paracetamol.  Indian J Dermatol. 2016 Jan-Feb;61(1):121. doi: 10.4103/0019-5154.174098.  Author information:  (1)Department of Dermatology, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Pathology, Christian Medical College, Vellore, Tamil Nadu, India.  We report a case of a 42-year-old male who presented with second episode of bullous eruptions after ingestion of paracetamol. There were no systemic complaints. The temporal correlation with the drug, history of a similar episode and the quick improvement led us to a diagnosis of bullous fixed drug due to paracetamol. Applying Naranjo's algorithm, a causality score of 8 was obtained and was categorized as probable reaction to paracetamol. Clinicians should be vigilant of the possible adverse reactions to drugs with robust safety profiles. Drug alert cards could play an important role in preventing recurrences. DOI: 10.4103/0019-5154.174098 | NAT | **JAN TO JUN** | **PMCID: PMC**4763646  **PMID:**26951737 |
|  | Agarwala MK(1), Schwartz ME(2), Smith FJ(2).  Pachyonychia Congenita: New Classification and Diagnosis.  Indian J Dermatol. 2016 Sep-Oct;61(5):567. doi: 10.4103/0019-5154.190110.  **Author information:**  (1)Department of Dermatology, Christian Medical College, Vellore, Tamil Nadu, India. E-mail: manoj.agw@gmail.com. (2)Pachyonychia Congenita Project, Salt Lake City, UT, USA.  Comment in Indian J Dermatol. 2016 Nov-Dec;61(6):675.  DOI: 10.4103/0019-5154.190110 | NAT | **JUL TO DEC** | **PMCID: PMC**5029248  **PMID:**27688452 |
|  | Alexander A(1), Mathew J(2), Varghese AM(2), Ganesan S(3).  Endoscopic Repair of CSF Fistulae: A Ten Year Experience.  J Clin Diagn Res. 2016 Aug;10(8):MC01-4. doi: 10.7860/JCDR/2016/18903.8390. Epub 2016 Aug 1.  **Author information:**  (1)Associate Professor, Department of Otolaryngology and Head and Neck Surgery, Jawaharlal Institute of Postgraduate Medical Education and Research , Puducherry, Tamil Nadu, India . (2)Professor, Department of Otolaryngology and Head and Neck Surgery, Christian Medical College , Vellore, Tamil Nadu, India . (3)Assistant Professor, Department of Otolaryngology and Head and Neck Surgery, Jawaharlal Institute of Postgraduate Medical Education and Research , Puducherry, Tamil Nadu, India  INTRODUCTION: Cerebrospinal Fluid (CFF) fistulae are repaired endoscopically with varying degrees of success around the world. Large series are still uncommon, and the results varied primarily because of the different techniques by different surgeons and also because of a variation in the patient profile in each series, for example, many series deal primarily with traumatic CSF leaks where the defects are larger and outcomes poorer. AIM: To analyse the surgical outcomes of Endoscopic CSF rhinorrhea closure.  MATERIALS AND METHODS: This is a series of 34 cases operated upon primarily by one surgeon in two different centres over a period of 10 years. RESULTS: Of the 34 cases, 76% of the patients were women. Among the patients only 20.6% patients had a history of trauma preceding the CSF leak. The most common site of leak was in the fovea ethmoidalis in 19 (55.8%) followed by 10 (29.4%) in the cribriform plate. An overlay technique of placing the multiple layers of fascia and mucosa was used in 26 (76.5%) patients and underlay technique in the remaining. Postoperative lumbar drain was used in all patients.  CONCLUSION: Based on the treatment outcome of the 34 patients, it can be concluded that the success rate of a single endoscopic procedure in our experience is 97% and 100% following the second. Endoscopic approach for closure of CSF leak is safe with minimal complications and little morbidity.  DOI: 10.7860/JCDR/2016/18903.8390 | NAT | **JUL TO DEC** | **PMCID: PMC**5028510  **PMID:**27656471 |
|  | Alexander M(1).  Author's reply.  Neurol India. 2016 Mar-Apr;64(2):361-2.  **Author information:**  (1)Department of Neurology, Christian Medical College, Vellore, Tamil Nadu – 632 004, India. | NAT | **JAN TO JUN** | **PMID:**26954832 |
|  | Alexander ST(1), Kattula D(2), Mannam P(3), Iyyadurai R(1).  Risperidone Induced Benign Intracranial Hypertension Leading to Visual Loss.  Indian J Psychol Med. 2016 May-Jun;38(3):249-51. doi: 10.4103/0253-7176.183075.  **Author information:**  (1)Department of Medicine, Christian Medical College and Hospital, Vellore, Tamil Nadu, India. (2)Department of Psychiatry, Christian Medical College and Hospital, Vellore, Tamil Nadu, India. (3)Department of Radiology, Christian Medical College and Hospital, Vellore, Tamil Nadu, India.  Benign intracranial hypertension (BIH) is a rare but potentially serious condition causing visual loss. Occasionally, medication use has been associated with the occurrence of BIH. We report the case of a 40-year-old obese lady being treated with risperidone for schizophrenia who presented with features of BIH. We report this case, occurring for the 1(st) time in India, to emphasize that a commonly used atypical antipsychotic drug can rarely cause BIH leading to visual loss. DOI: 10.4103/0253-7176.183075 | NAT | **JAN TO JUN** | **PMCID: PMC**4904763  **PMID:**27335522 |
|  | Arora S(1), Akhil R(1), Chacko RT(1), George R(2).  Palmar-plantar erythrodysesthesia: An uncommon adverse effect of everolimus.  Indian J Med Paediatr Oncol. 2016 Apr-Jun;37(2):116-8. Doi  **Author information:**  (1)Department of Medical Oncology, Christian Medical College Hospital, Vellore,Tamil Nadu, India. (2)Department of Dermatology, Venereology and Leprosy,Christian Medical College Hospital, Vellore, Tamil Nadu, India.Mammalian target of rapamycin inhibitor everolimus is a novel agent used inendocrine therapy resistant hormone receptor positive metastatic breast cancer.Its use has been associated with clinically significant improvement in theotherwise dismal outcomes of this subset of patients. Rash is a common adverseeffect associated with everolimus. However, Hand-foot syndrome is an uncommontoxicity with the use of this drug. We report a case of Grade 3 hand-footsyndrome following institution of everolimus therapy and describe its successfulmanagementDOI: 10.4103/0971-5851.180143 | NAT | **JAN TO JUN** | **PMCID: PMC**4854043  **PMID:**27168711 |
|  | Arthur A(1), Horo S(2), Balasubramanian DA(3), Peter J(1), Ram TS(4), Peter  JV(5).  Orbital Metastasis of Cervical Carcinoma - Case Report and Review of Literature  J Clin Diagn Res. 2016 Jan;10(1):ND01-2. doi: 10.7860/JCDR/2016/14400.7085. Epub2016 Jan 1.  **Author information:**  (1)Assistant Professor, Department of Ophthalmology, Christian Medical College,Vellore Christian Medical College , Vellore, Tamil Nadu, India . (2)AssociateProfessor, Department of Ophthalmology, Christian Medical College, VelloreChristian Medical College , Vellore, Tamil Nadu, India . (3)Postgraduate Student,Department of Ophthalmology, Christian Medical College, Vellore Christian MedicalCollege , Vellore, Tamil Nadu, India . (4)Professor, Department of RadiationTherapy, Christian Medical College, Vellore Christian Medical College , VelloreTamil Nadu, India . (5)Professor, Department of Medicine, Christian MedicalCollege, Vellore Christian Medical College , Vellore, Tamil Nadu, India The orbit is a frequent site of metastasis, particularly from the breast,prostate gland and the lung. Carcinoma of the cervix metastasizing to the orbitis rare. We report a 27-year-old woman with Stage II B cervical cancer whopresented with progressive painless protrusion of the left eye of one monthduration associated with diplopia. Histology of the orbital mass was similar tothat of the cervical cancer and reported as squamous cell carcinoma. She receivedpalliative radiation to the left orbit 30 Gy in 10 fractions along withchemotherapy (Paclitaxel and Carboplatin). This resulted in regression of theproptosis. We review published literature of cases of carcinoma of the uterinecervix with metastasis to the orbit. | NAT | **JAN TO JUN** | **PMCID: PMC**4740630  **PMID:**26894102 |
|  | Bakthavatchalam YD(1), Anandan S(1), Veeraraghavan B(1).  Laboratory Detection and Clinical Implication of Oxacillinase-48 likeCarbapenemase: The Hidden Threat  J Glob Infect Dis. 2016 Jan-Mar;8(1):41-50. doi: 10.4103/0974-777X.176149.  **Author information:**  (1)Department of Clinical Microbiology, Christian Medical College, Vellore, TamilNadu, India.Carbapenemase producing Gram-negative pathogen is of great concern for physicianThe challenging aspects are treatment option and infection control. Monitoring ofrespective carbapenemase resistance mechanism is necessary to prevent theoutbreaks. Currently, the rapid emergence of oxacillinase (OXA-48) like isalarming. Increasing frequency of OXA-48 is seen than the classical carbapenemase(KPC, NDM, IMP, and VIM) across the world. The bla OXA-48 gene is commonlyidentified in Escherichia coli and Klebsiella pneumoniae. The transferrableplasmid of OXA-48 is associated with rapid spread and inter-speciesdissemination. In general, OXA-48-like enzymes weakly hydrolyzes both carbapenemand broad spectrum cephalosporins. Except OXA-163, which effectively hydrolyzecephalosporin. This poor hydrolytic profile obscures the detection ofOXA-48-like. It may go undetected in routine diagnosis and complicates thetreatment option. Co-production of OXA-48-like with CTX-M-15 and othercarbapenemase (NDM, VIM) leads to the emergence of multidrug resistant strains.DOI: 10.4103/0974-777X.176149 | NAT | **JAN TO JUN** | **PMCID: PMC**4785756  **PMID:**27013843 |
|  | Bakthavatchalam YD(1), Veeraraghavan B(1), Mathur P(2), Purighalla S(3), RichardVS(3).  Polymyxin Nordmann/Poirel test for rapid detection of polymyxin resistance inEnterobacteriaceae: Indian experience.  Indian J Med Microbiol. 2016 Oct-Dec;34(4):564-565. doi:  **Author information:**  (1)Department of Clinical Microbiology, Christian Medical College, Vellore, TamilNadu, India. (2)Department of Pathology, All Institute of Medical Science, NewDelhi, India. (3)Department of Hospital Infection Control, Narayana HealthBengaluru, Karnataka, India | NAT | **JUL TO DEC** | **PMID:**27934849 |
|  | Bal HS(1), Sen S(2), Karl S(1), Mathai J(1), Thomas RJ(1).  An assessment of quality of life of operated cases of esophageal atresia in thecommunity  J Indian Assoc Pediatr Surg. 2016 Jul-Sep;21(3):131-8. doi:10.4103/0971-9261.182588.  **Author information:**  (1)Department of Pediatric Surgery, Christian Medical College, Vellore, India.(2)Department of Pediatric Surgery, PSG Institute of Medical Sciences andResearch, Coimbatore, Tamil Nadu, India  AIMS: To evaluate the outcome of the operated children of esophageal atresia (EA)focusing on their early and late morbidity and mortality and quality of life(QoL) of survivors  SETTINGS AND DESIGN: A cross-sectional follow-up with retrospective analysis ofavailable medical and surgical records of children who underwent repair for EA.  MATERIALS AND METHODS: The medical records of the children who underwent repairfor EA during the period from 2000 to 2011 at the Christian Medical CollegeHospital, Vellore, were collected retrospectively. Patients with parents wereinvited to visit the hospital for follow-up and nutritional status, digestive andrespiratory symptoms, status of associated anomalies and QoL assessment ofchildren done. QoL assessment was done using the PedsQL™ 4.0 generic core scalesquestionnaire comprising 4 scale scores: physical, emotional, social functioning,and school functioning. Mean scores are calculated based on a 5-point responsescale for each item and transformed to a 0-100 scale with a higher scorerepresenting better QoL.  STATISTICAL ANALYSIS USED: Statistical Package for Social Sciences (SPSS) version16 using Chi-square or Fisher's exact test.  RESULTS: Of 79 patients operated during the said period, there were 10 deaths anda total of 69 (87%) children survived. Of the 66 patients available forfollow-up, we interviewed 30 parents and children while for the remaining 36children, out-patients charts were reviewed retrospectively. Mean follow-upduration was 3.56 years. The height and weight for age measurement showed 47% and56% of children respectively as below the 5(th) percentile. Main problems facedby operated EA children were of the respiratory (26%) and gastroesophageal (36%)tracts. In spite of the mentioned problems faced, the overall QoL of this groupappeared good. In 23 of 30 patients, who answered PedsQL™, more than 70% hadscores >85 out of 100 in QoL scoring.  CONCLUSIONS: While survivals of the children born with EA have improved, thesechildren still face nutritional, respiratory, and gastroesophageal problemsduring their early childhood. In spite of this, the overall QoL of this patientgroup appears good.DOI: 10.4103/0971-9261.182588 | NAT | **JUL TO DEC** | **PMCID: PMC**4895739  **PMID:**27365908 |
|  | Bal HS(1), Sen S(2).  The use of ileocolic segment for esophageal replacement in children.  J Indian Assoc Pediatr Surg. 2016 Jul-Sep;21(3):116-9. doi:10.4103/0971-9261.182584.  **Author information:**  (1)Department of Pediatric Surgery, Christian Medical College, Vellore, India.  (2)Department of Pediatric Surgery, PSG Institute of Medical Science andRescearch, Coimbatore, Tamil Nadu, India.  AIMS: To evaluate and describe the procedure and outcome of ileocolic replacementof esophagus.  MATERIALS AND METHODS: We review 7 children with esophageal injuries, whounderwent esophageal replacement using ileocolic segment in Christian MedicalCollege, Vellore, India between 2006 and 2014.  RESULTS: The ileocolic segment was used in 7 children with scarred or inadequateesophagus. There were 4 girls and 3 boys, who underwent esophageal replacementusing isoperistaltic ileocolic segment in this period. Age at presentation variedfrom 1 month to 14 years with an average of 4.6 years. The indications forileocolic replacements were corrosive strictures in 5, failed esophageal atresiarepair in one and gastric volvulus related esophageal stricture in another. Theaverage follow-up duration was 37 months. One child with corrosive stricture lostto follow-up and died 2 years later in another center. Other 6 children were freeof dysphagia till the last follow-up.  CONCLUSIONS: Although the ileocolic segment is not commonly used for esophagealsubstitution, it can be useful in special situations where the substitution needsto reach the high cervical esophagus and also where the stomach is scarred andnot suitable for gastric pull-upDOI: 10.4103/0971-9261.182584 | NAT | **JUL TO DEC** | **PMCID: PMC**4895735  **PMID:**27365904 |
|  | Bhageerathy PS(1), Thomas A(1), Thomas V(1), Keshava SN(2), Peedicayil A(1).  Femoral Arterial Blowout Post Groin Recurrence in Vulvar Carcinoma - NovelEndovascular Management  Indian J Surg Oncol. 2016 Dec;7(4):456-459. Epub 2016 Apr 23.  **Author information:**  (1)Department of Gynaecologic Oncology, Christian Medical College, Vellore, TamilNadu 632004 India. (2)Department of Interventional Radiology, Christian MedicalCollege, Vellore, Tamil Nadu 632004 India.DOI: 10.1007/s13193-016-0521-5 | NAT | **JUL TO DEC** | **PMID:**27872535 |
|  | Boaz RJ(1), Dangi AD(1), John NT(1).  Antiurolithiatic effect of lithocare against ethylene glycol-induced urolithiasis  Indian J Pharmacol. 2016 May-Jun;48(3):340-1. doi: 10.4103/0253-7613.182897  **Author information:**  (1)Department of Urology, Christian Medical College, Vellore, Tamil Nadu, India.DOI: 10.4103/0253-7613.182897 | NAT | **JAN TO JUN** | **PMCID: PMC**4900018  **PMID:**27298515 |
|  | Chacko G(1).  Epidermal growth factor gene amplification in high grade gliomas.  Neurol India. 2016 Jan-Feb;64(1):25-6. doi: 10.4103/0028-3886.173672.  **Author information:**  (1)Department of Pathology, Christian Medical College, VelloreTamilNadu,India.DOI: 10.4103/0028-3886.173672 | NAT | **JAN TO JUN** | **PMID:**26754987 |
|  | Chacko MP(1), Augustin A(1), David VG(2), Valson AT(2), Daniel D(1).  Nonspecific positivity on the Luminex crossmatch assay for anti-human leukocyteantigen antibodies due to antibodies directed against the antibody coated beads.  Indian J Nephrol. 2016 Mar-Apr;26(2):134-7. doi: 10.4103/0971-4065.159305  **Author information:**  (1)Department of Transfusion Medicine and Immunohematology, Christian MedicalCollege, Vellore, Tamil Nadu, India. (2)Department of Nephrology, ChristianMedical College, Vellore, Tamil Nadu, India.  Two cases are described of previously unreported false positivity on the Luminexcrossmatch assay due to non HLA specific antibodies directed against the beads.In both cases the Luminex crossmatch indicated the presence of donor specificantibodies to class II HLA antigens, which was not substantiated by the clinicalscenario or other assays. We could demonstrate the non specificity of theseantibodies through using the same assay in a modified form where beads wereunexposed to cell lysate and therefore did not carry HLA antigens at all. Thesecases further serve to emphasize the absolute necessity of correlating positiveresults with the priming history, and confirming their relevance using otherplatforms.DOI: 10.4103/0971-4065.159305 | NAT | **JAN TO JUN** | **PMCID: PMC**4795430  **PMID:**27051139 |
|  | Chanana L(1), Atre K(2), Galwankar S(3), Kelkar D(4).  State of the Globe: What's the Right Test for Diagnosing Rickettseal Diseases.  J Glob Infect Dis. 2016 Jul-Sep;8(3):95-6. doi: 10.4103/0974-777X.188581.  **Author information:**  (1)Honourable Fellow of the Academic College of Emergency Experts, Vellore,India. (2)Christian Medical College, Vellore, India. (3)Department of EmergencyMedicine, University of Florida, Jacksonville, USA. (4)Department of EmergencyMedicine, Section of Infectious Diseases, Winter Haven Hospital Division,University of Florida, Jacksonville, USA.DOI: 10.4103/0974-777X.188581 | NAT | **JUL TO DEC** | **PMCID: PMC**4997799  **PMID:**27621558 |
|  | Chandramohan A(1), Khurana A(1), Pushpa BT(1), Manipadam MT(2), Naik D(3), ThomasN(3), Abraham D(4), Paul MJ(4).  Is TIRADS a practical and accurate system for use in daily clinical practice?  Indian J Radiol Imaging. 2016 Jan-Mar;26(1):145-52. doi:10.4103/0971-3026.178367.  **Author information:**  (1)Department of Radiology, Christian Medical College, Vellore, Tamil Nadu,India. (2)Department of Pathology, Christian Medical College, Vellore, TamilNadu, India. (3)Department of Endocrinology, Christian Medical College, Vellore,Tamil Nadu, India. (4)Department of Endocrine Surgery, Christian Medical College,Vellore, Tamil Nadu, India.  AIM: To assess the positive predictive value (PPV) and inter-observer agreementof Thyroid Imaging Reporting and Data System (TIRADS) as described by Kwak et al.MATERIALS AND METHODS: This was a prospective study wherein ultrasound wasperformed by two radiologists on patients with thyroid nodules >1 cm. The thirdradiologist interpreted archived images. Ultrasound features and TIRADS categorywere compared with cytology and surgical histopathology. PPV was calculated forall readers' combined assessment. Inter-observer agreement was calculated usinglinear weighted kappa.RESULTS: A total of 238 patients with 272 nodules of mean size 2.9 ± 1.7 cm wereincluded. PPV for malignancy was 6.6%, 32%, 36%, 64%, 59%, and 91% for TIRADS 2,3, 4a, 4b, 4c, and 5 categories, respectively. Inter-observer agreement wassubstantial [kappa (k) = 0.61-0.80] for assessment of nodule echogenicity,margins, calcification, and shape and good (k = 0.570, P < 0.001) for assessmentof composition of the thyroid nodules. Overall agreement between observers wassubstantial for assigning TIRADS category [multi-rater weighted kappa coefficient(wt k) = 0.721, P < 0.001].CONCLUSIONS: TIRADS is a simple and practical method of assessing thyroid noduleswith high PPV and good inter-observer agreement.DOI: 10.4103/0971-3026.178367 | NAT | **JAN TO JUN** | **PMCID: PMC**4813066  **PMID:**27081240 |
|  | Chandy SJ(1).  The need for a comprehensive medication safety module in medical education.  Indian J Pharmacol. 2016 Oct;48(Suppl 1):S57-S60. doi: 10.4103/0253-7613.193324.  **Author information:**  (1)Department of Pharmacology and Clinical Pharmacology, Christian Medical College, Vellore, Tamil Nadu, India; Department of Public Health Sciences, Karolinska Institutet, Stockholm, Sweden.  OBJECTIVE: A rising number of medicines and minimal emphasis on rational prescribing in the medical curriculum may compromise medication safety. There is no focused module in the curriculum dealing with factors affecting safety such as quality, medicines management, rational use, and approach to adverse effects. Creating awareness of these issues would hopefully plant a seed of safe prescribing and encourage pharmacovigilance. A study was therefore done to determine the need for such a module. METHOD: A quasi-experimental pre-post module study. Medical students (n = 88) completing pharmacology term were recruited after informed consent. A questionnaire containing 20 questions on various themes was administered and scored. Subsequently a module was developed and relevant safety themes taught to the students. After one month, the questionnaire was re-administered. RESULTS: The pre module score was 9.52/20. Knowledge about the various themes, adverse effects, medication management, quality issues and rational use were similar though poor knowledge was evident in specific areas such as clinical trials, look alike-sound alike medicines (LASA) and medicine storage. The post module score was 12.24/20. The improvement of score was statistically significant suggesting the effectiveness of the module. CONCLUSION: The relatively poor knowledge and improvement with a specific educational module emphasizes the need of such a module within the medical curriculum to encourage safe use of medicines by Indian Medical Graduates (IMG). It is hoped that the policy makers in medical education will introduce such a module within the medical curriculum.  DOI: 10.4103/0253-7613.193324 | NAT | **JUL TO DEC** | PMID: 28031610 PMCID: PMC5178058 |
|  | Chilbule SK(1), Dutt V(1), Madhuri V(1).  Limb lengthening in achondroplasia.  Indian J Orthop. 2016 Jul-Aug;50(4):397-405. doi: 10.4103/0019-5413.185604.  **Author information:**  (1)Pediatric Orthopedics Unit, Christian Medical College, Vellore, Tamil Nadu, India.  BACKGROUND: Stature lengthening in skeletal dysplasia is a contentious issue. Specific guidelines regarding the age and sequence of surgery, methods and extent of lengthening at each stage are not uniform around the world. Despite the need for multiple surgeries, with their attendant complications, parents demanding stature lengthening are not rare, due to the social bias and psychological effects experienced by these patients. This study describes the outcome and complications of extensive stature lengthening performed at our center.  MATERIALS AND METHODS: Eight achondroplasic and one hypochondroplasic patient underwent bilateral transverse lengthening for tibiae, humeri and femora. Tibia lengthening was carried out using a ring fixator and bifocal corticotomy, while a monolateral pediatric limb reconstruction system with unifocal corticotomy was used for the femur and humerus. Lengthening of each bone segment, height gain, healing index and complications were assessed. Subgroup analysis was carried out to assess the effect of age and bone segment on the healing index.  RESULTS: Nine patients aged five to 25 years (mean age 10.2 years) underwent limb lengthening procedures for 18 tibiae, 10 femora and 8 humeri. Four patients underwent bilateral lengthening of all three segments. The mean length gain for the tibia, femur and humerus was 15.4 cm (100.7%), 9.9 cm (52.8%) and 9.6 cm (77.9%), respectively. Healing index was 25.7, 25.6 and 20.6 days/cm, respectively, for the tibia, femur and humerus. An average of 33.3% height gain was attained. Lengthening of both tibia and femur added to projected height achieved as the 3(rd) percentile of standard height in three out of four patients. In all, 33 complications were encountered (0.9 complications per segment). Healing index was not affected by age or bone segment.  CONCLUSION: Extensive limb lengthening (more than 50% over initial length) carries significant risk and should be undertaken only after due consideration.  DOI: 10.4103/0019-5413.185604 | NAT | **JUL TO DEC** | **PMCID: PMC**4964773  **PMID:**27512222 |
|  | Chowdhury SD(1), Kurien RT(2), Ramachandran A(2), Joseph AJ(2), Simon EG(2),Dutta AK(2), David D(2), Kumar C B(2), Samuel P(3), Balasubramaniam KA(2).  Pancreatic exocrine insufficiency: Comparing fecal elastase 1 with 72-h stool forfecal fat estimation.  Indian J Gastroenterol. 2016 Nov;35(6):441-444. Epub 2016 Nov 23.  **Author information:**  (1)Division of Gastrointestinal Sciences, Christian Medical College, Vellore, 632 004, India. sudipto.d.c@gmail.com. (2)Division of Gastrointestinal Sciences, Christian Medical College, Vellore, 632 004, India. (3)Department of Biostatistics, Christian Medical College, Vellore, 632 004, India.  INTRODUCTION: Identification of pancreatic exocrine insufficiency (PEI) is important in the management of chronic pancreatitis. The 72-h stool for fecal fat estimation (FFE) has long been considered a gold standard indirect test for the diagnosis of PEI. However, the test is cumbersome for both patients and laboratory personnel alike. In this study, we aimed to assess fecal elastase 1 (FE1) as an alternate to FFE for the diagnosis of PEI.  METHODS: In all, 87 consecutive patients diagnosed with chronic pancreatitis were included in this study. FFE and FE1 estimation was done for all the patients. For FE1, two cutoffs (<100 and <200 μg) were selected to define pancreatic exocrine insufficiency. The sensitivity, specificity, and positive and negative predictive values for the two cutoffs were estimated. Kappa statistics was used to assess degree of agreement between both tests.  RESULTS: All patients completed the study and were included in the analysis. The sensitivity, specificity, and positive and negative predictive value and PABAK (prevalence and bias adjusted kappa) for FE1 <100 μg was 84.9, 47.6, 83.6, 50, and 0.52, respectively. For FE1 <200 μg, it was 90.9, 9.5, 75.95, 25, and 0.43, respectively.  CONCLUSION: FE1 is a sensitive test; however, it does not have a good agreement with FFE. FE1 may be used as screening test for PEI in patients with chronic pancreatitis.  DOI: 10.1007/s12664-016-0714-4 | NAT | **JUL TO DEC** | **PMID:**27878466 |
|  | Deshpande P(1), Kathirvel K(1), Alex AA(1), Korula A(1), George B(1), Shaji  RV(1), Mathews V(2).  Leukocyte Adhesion Deficiency-I: Clinical and Molecular Characterization in anIndian Population.  Indian J Pediatr. 2016 Aug;83(8):799-804. doi: 10.1007/s12098-016-2051-0. Epub2016 Feb 29.  **Author information:**  (1)Department of Hematology, Christian Medical College, Vellore, 632004, Tamil Nadu, India. (2)Department of Hematology, Christian Medical College, Vellore, 632004, Tamil Nadu, India. vikram@cmcvellore.ac.in.  OBJECTIVE: To describe clinical and flow cytometric immunophenotyping details of 26 patients of Leukocyte adhesion deficiency-I (LAD-I) along with molecular characterization of 7 patients.  METHODS: Diagnosis of LAD-I was suspected on the basis of clinical features, white blood cell count and absolute neutrophil counts and flow cytometric assessment of expression of CD18 and CD11(a, b, c) on leukocytes. Mutation analysis was performed using DNA PCR and conformation sensitive gel electrophoresis (CSGE) technique followed by sequencing.  RESULTS: All the patients were symptomatic by the age of 6 mo, with history of recurrent bacterial infections involving skin, mucosa or umbilical cord (omphalitis) being the most frequent presenting symptoms. White blood cells (WBC) and absolute neutrophil counts (ANC) were markedly elevated, without any specific morphological findings. On flow cytometry, CD11a and CD11c showed moderate correlation with CD18 expression. Mutation analysis was performed in 7 patients and six different mutations (4 missense, 2 nonsense and 1 splice site) were identified, all of which were homozygous in nature.  CONCLUSIONS: A presentation of repeated bacterial infections during infancy, especially omphalitis, with markedly elevated absolute neutrophil counts should trigger investigations for LAD-I including flow cytometric analysis of CD11/CD18 expression.  DOI: 10.1007/s12098-016-2051-0 | NAT | **JUL TO DEC** | **PMID:**26924654 |
|  | Devasia AJ(1), Irodi A(2), George B(3).  Broncho-Pericardial Fistula Leading to Pneumopericardium Following AllogeneicStem Cell Transplantation.  Indian J Pediatr. 2016 Oct;83(10):1206-7. doi: 10.1007/s12098-016-2117-z. Epub2016 Apr 29.  **Author information:**  (1)Department of Clinical Hematology, Christian Medical College, Vellore, Tamil Nadu, 632004, India. (2)Department of Radiology, Christian Medical College, Vellore, Tamil Nadu, India. (3)Department of Clinical Hematology, Christian Medical College, Vellore, Tamil Nadu, 632004, India. biju@cmcvellore.ac.in.  DOI: 10.1007/s12098-016-2117-z | NAT | **JUL TO DEC** | **PMID:**27130507 |
|  | Devasia AJ(1), Joy B(2), Tarey SD(3).  Serum homocysteine as a risk factor for carotid intimal thickening in acutestroke: A cross sectional observational study.  Ann Indian Acad Neurol. 2016 Jan-Mar;19(1):48-51. doi: 10.4103/0972-2327.168633.  **Author information:**  (1)Department of Hematology, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Radiology, St. John's Medical College, Bangalore, Karnataka, India. (3)Department of Internal Medicine, St. John's Medical College, Bangalore, Karnataka, India.  INTRODUCTION: The present study aimed to analyse if there is a correlation between carotid intima medial thickening (CIMT) and Hcy in stroke patients. METHODOLOGY: We studied 100 consecutive cases of acute anterior circulation strokes at St. John's Medical College, Bangalore, India. Fasting serum samples for homocysteine were sent within 24 hours of admission and all patients underwent a carotid Doppler scan and carotid intima-medial thickness (CIMT) was estimated on both sides. RESULTS: There was significant correlation between serum homocysteine levels and carotid intima-medial thickness (r = 0.409, p = 0.000). Also after controlling for other possible risk factors it was found that elevations in serum homocysteine levels would cause a variation of 60% in the carotid intima-medial thickening. CONCLUSION: Serum Hcy levels correlate well with CIMT and hence may predict atherothrombotic events. DOI: 10.4103/0972-2327.168633 | NAT | **JAN TO JUN** | **PMCID: PMC**4782552  **PMID:**27011628 |
|  | Devika S, Jeyaseelan L(1), Sebastian G.  Analysis of sparse data in logistic regression in medical research: A newerapproach.  J Postgrad Med. 2016 Jan-Mar;62(1):26-31. doi: 10.4103/0022-3859.173193.  **Author information:**  (1)Department of Biostatistics, Christian Medical College, Vellore, Tamil Nadu, India.  BACKGROUND AND OBJECTIVE: In the analysis of dichotomous type response variable, logistic regression is usually used. However, the performance of logistic regression in the presence of sparse data is questionable. In such a situation, a common problem is the presence of high odds ratios (ORs) with very wide 95% confidence interval (CI) (OR: >999.999, 95% CI: <0.001, >999.999). In this paper, we addressed this issue by using penalized logistic regression (PLR) method. MATERIALS AND METHODS: Data from case-control study on hyponatremia and hiccups conducted in Christian Medical College, Vellore, Tamil Nadu, India was used. The outcome variable was the presence/absence of hiccups and the main exposure variable was the status of hyponatremia. Simulation dataset was created with different sample sizes and with a different number of covariates. RESULTS: A total of 23 cases and 50 controls were used for the analysis of ordinary and PLR methods. The main exposure variable hyponatremia was present in nine (39.13%) of the cases and in four (8.0%) of the controls. Of the 23 hiccup cases, all were males and among the controls, 46 (92.0%) were males. Thus, the complete separation between gender and the disease group led into an infinite OR with 95% CI (OR: >999.999, 95% CI: <0.001, >999.999) whereas there was a finite and consistent regression coefficient for gender (OR: 5.35; 95% CI: 0.42, 816.48) using PLR. After adjusting for all the confounding variables, hyponatremia entailed 7.9 (95% CI: 2.06, 38.86) times higher risk for the development of hiccups as was found using PLR whereas there was an overestimation of risk OR: 10.76 (95% CI: 2.17, 53.41) using the conventional method. Simulation experiment shows that the estimated coverage probability of this method is near the nominal level of 95% even for small sample sizes and for a large number of covariates. CONCLUSIONS: PLR is almost equal to the ordinary logistic regression when the sample size is large and is superior in small cell values. DOI: 10.4103/0022-3859.173193 | NAT | **JAN TO JUN** | **PMCID: PMC**4944325  **PMID:**26732193 |
|  | Dhanyee AS(1), Pillai R(1), Sahajanandan R(1).  Wire guided fibreoptic retrograde intubation in a case of glottic mass.  Indian J Anaesth. 2016 Mar;60(3):219-21. doi: 10.4103/0019-5049.177876.  **Author information:**  (1)Department of Anaesthesia, Christian Medical College and Hospital, Vellore, Tamil Nadu, India.  DOI: 10.4103/0019-5049.177876 | NAT | **JAN TO JUN** | **PMCID: PMC**4800944  **PMID:**27053791 |
|  | Dutta AK(1), Paulose BK(2), Danda S(1), Alexander S(2), Tamilarasi V(2),Omprakash S(1).  Recurrent truncating mutations in alanine-glyoxylate aminotransferase gene in twoSouth Indian families with primary hyperoxaluria type 1 causing later onsetend-stage kidney disease.  Indian J Nephrol. 2016 Jul-Aug;26(4):288-90. doi: 10.4103/0971-4065.171244.  **Author information:**  (1)Department of Medical Genetics, Christian Medical College and Hospital, Vellore, Tamil Nadu, India. (2)Department of Nephrology, Christian Medical College and Hospital, Vellore, Tamil Nadu, India.  Primary hyperoxaluria type 1 is an autosomal recessive inborn error of metabolism due to liver-specific peroxisomal enzyme alanine-glyoxylate transaminase deficiency. Here, we describe two unrelated patients who were diagnosed to have primary hyperoxaluria. Homozygous c.445\_452delGTGCTGCT (p.L151NfsJUL TO DEC14) (Transcript ID: ENST00000307503; human genome assembly GRCh38.p2) (HGMD ID CD073567) mutation was detected in both the patients and the parents were found to be heterozygous carriers. Our patients developed end-stage renal disease at 23 years and 35 years of age. However, in the largest series published from OxalEurope cohort, the median age of end-stage renal disease for null mutations carriers was 9.9 years, which is much earlier than our cases. Our patients had slower progressions as compared to three unrelated patients from North India and Pakistan, who had homozygous c.302T>C (p.L101P) (HGMD ID CM093792) mutation in exon 2. Further, patients need to be studied to find out if c.445\_452delGTGCTGCT mutation represents a founder mutation in Southern India.  DOI: 10.4103/0971-4065.171244 | NAT | **JUL TO DEC** | **PMCID: PMC**4964691  **PMID:**27512303 |
|  | Eapen A, Gibikote S(1).  Role of Computed Tomography in Pediatric Abdominal Conditions.  Indian J Pediatr. 2016 Jul;83(7):691-701. doi: 10.1007/s12098-016-2030-5. Epub2016 Mar 11.  **Author information:**  (1)Department of Radiology, Christian Medical College, Vellore, Tamil Nadu, 632004, India. gibikote@cmcvellore.ac.in.  In the pediatric patient, computed tomography (CT) scan as an imaging modality for evaluation of the abdomen is to be used judiciously. The use of correct scanning protocols, single phase scanning, scanning only when required are key factors to minimize radiation doses to the child, while providing diagnostic quality. CT is the preferred modality in the evaluation of trauma, to assess extent of solid organ or bowel injury. It is also useful in several inflammatory conditions such as inflammatory bowel diseases and acute pancreatitis. CT also has an important role in evaluating intra-abdominal tumors, although magnetic resonance imaging (MRI) can be used as an alternative to CT.  DOI: 10.1007/s12098-016-2030-5 | NAT | **JUL TO DEC** | **PMID:**26964550 |
|  | Ebenezer K(1), Dawodu A(2), Steinhoff M(2).  Serum Vitamin D Status and Outcome among Critically Ill Children Admitted to thePediatric Intensive Care Unit in South India: Authors' Reply.  Indian J Pediatr. 2016 Aug;83(8):912-3. doi: 10.1007/s12098-015-1991-0. Epub 2016Jan 14.  **Author information:**  (1)Department of Pediatrics, Christian Medical College, Vellore, 632004, Tamil Nadu, India. kinbaraj@cmcvellore.ac.in. (2)Global Health Centre, Cincinnati Children's Medical Centre, Cincinnati, OH, USA.  DOI: 10.1007/s12098-015-1991-0 | NAT | **JUL TO DEC** | **PMID:**26762329 |
|  | Ebenezer K(1), Job V(2), Antonisamy B(3), Dawodu A(4), Manivachagan MN(5),Steinhoff M(4).  Serum Vitamin D Status and Outcome among Critically Ill Children Admitted to thePediatric Intensive Care Unit in South India.  Indian J Pediatr. 2016 Feb;83(2):120-5. doi: 10.1007/s12098-015-1833-0. Epub 2015Jul 19.  **Author information:**  (1)Department of Pediatrics, Christian Medical College, Vellore, 632004, Tamil Nadu, India. kinbaraj@cmcvellore.ac.in. (2)Department of Clinical Biochemistry, Christian Medical College, Vellore, Tamil Nadu, India. (3)Department of Biostatistics, Christian Medical College, Vellore, Tamil Nadu, India. (4)Global Health Centre, Cincinnati Children's Medical Centre, Cincinnati, OH, USA. (5)Department of Pediatrics, Christian Medical College, Vellore, 632004, Tamil Nadu, India.  **Comment in :** Indian J Pediatr. 2016 Feb;83(2):101-2.  OBJECTIVES: To determine the vitamin D status and the association between vitamin D status and the clinical outcome of critically ill children admitted to pediatric intensive care unit (PICU) in South India. METHODS: Fifty-four consecutive children with medical and surgical diagnoses were included with parental consent. Severity of illness was assessed using PIM-2 score; Sequential Organ Failure Assessment Cardiovascular Score (CV-SOFA) was used to describe vasopressor use. Serum for 25(OH) D levels was obtained as close as possible to the ICU admission. Vitamin D deficiency was defined as serum 25(OH) D level < 20 ng/ml (50 nmol/L). Primary outcome measures were serum 25(OH) D level and in-hospital all cause mortality. Secondary outcomes were illness severity, vasopressor requirement, use of mechanical ventilation and duration of ICU stay. RESULTS: Of the 54 children, two were excluded due to insufficient serum for vitamin D analysis. Median age was 17.5 mo (IQR = 4.5-78); 38.5 % were infants. Higher age was associated with low vitamin D levels (r s  = -0.34; p 0.01). Median serum 25(OH) D level was 25.1 ng/ml (IQR = 16.2-34.2). Shock (30.8 %), CNS conditions (23.1 %) and respiratory illnesses (21.2 %) were the three most common reasons for admission to the PICU. Vitamin D deficiency was seen in 40.3 % of the critically ill children. Higher PIM score or SOFA score were associated with low vitamin levels (r s  = -0.29, p 0.04 and r s  = -0.29, p 0.05 respectively). Children who were mechanically ventilated had a significantly lower median serum 25(OH) D level than those who were not on ventilation [19.5 ng/ml (IQR = 14.6-27.7)] vs. 32.1 ng/ml[(IQR = 16.5-50.9), p 0.01]. Serum 25(OH) D level was also positively associated with serum calcium levels (r s = 0.32, p 0.03). The proportion of children who died or were discharged terminally at parental request was 23.8 % among those with serum 25(OH) D level < 20 ng/ml as compared to 16.1 % among those with serum 25(OH) D level > 20 ng/ml (p 0.49). CONCLUSIONS: Vitamin D deficiency is common among pediatric patients admitted to PICU in South India. Low serum 25(OH) D level was associated with higher severity of illness, need for mechanical ventilation, more vasopressor use and lower serum calcium levels. No association between vitamin D status and mortality was demonstrated. DOI: 10.1007/s12098-015-1833-0 | NAT | **JAN TO JUN** | **PMID:**26187509 |
|  | Ganapule AP(1), Varghese SS(2), Chacko G(3), Aparna I(4), Viswabandya A(1).  Glioblastoma Multiforme in a Post Allogeneic Stem Cell Transplant Patient. A CaseReport and Literature Review of Post Transplant Neurological Tumors.  Indian J Hematol Blood Transfus. 2016 Jun;32(Suppl 1):192-5. doi:10.1007/s12288-015-0500-y. Epub 2015 Jan 14.  **Author information:**  (1)Department of Haematology, Christian Medical College and Hospital, Ida Scudder Road, Vellore, 632004 Tamil Nadu India. (2)Depatment of Radiotherapy, Christian Medical College and Hospital, Ida Scudder Road, Vellore, 632004 Tamil Nadu India. (3)Department of Pathology, Christian Medical College and Hospital, Ida Scudder Road, Vellore, 632004 Tamil Nadu India. (4)Department of Radiology, Christian Medical College and Hospital, Ida Scudder Road, Vellore, 632004 Tamil Nadu India.  Seventeen year old boy, a case of relapsed acute lymphoblastic leukemia 10 yearspost allogeneic transplantation, presented to us with acute onset of right hemiparesis. The imaging revealed contrast enhancing lesion in the frontal lobe, biopsy of the same was consistent with glioblastoma multiforme (GBM). He had received total body irradiation (TBI) based conditioning regimen prior to transplant. GBM was treated with left parietal craniotomy and parietal excision of tumour, followed by radiation therapy with concurrent and adjuvant chemotherapy. Disease progressed while was on adjuvant chemotherapy and patient succumbed to his illness 8 months after the diagnosis of GBM. We report here a here unusual case of GBM in a post transplant patient who received TBI based conditioning regimen. DOI: 10.1007/s12288-015-0500-y | NAT | **JAN TO JUN** | **PMCID: PMC**4925482  **PMID:**27408389 |
|  | Garon J(1), Orenstein W, John TJ.  The Need and Potential of Inactivated Poliovirus Vaccine.  Indian Pediatr. 2016 Aug 7;53 Suppl 1:S2-S6.  **Author information:**  (1)Division of Infectious Diseases, Emory University School of Medicine, Atlanta, Georgia, USA, and Retired Professor of Clinical Virology, Christian Medical College, Vellore, Tamil Nadu, India. Correspondence to: Julie Garon, Emory University, School of Medicine, Division of Infectious Diseases, 1462 Clifton Road, Room 446, Atlanta, GA 30322, USA. julie.garon@emory.edu.  As the polio endgame progresses, the world will increasingly rely on inactivated polio vaccine (IPV) for protection against polio (wild and vaccine-related) and for risk mitigation during the phased removal of oral polio vaccine (OPV). IPV has already been introduced in most countries and strategies are underway to ensure the remaining OPV-only using countries succeed in introducing IPV in light of operational challenges. Questions remain as to the ideal dosing schedule for IPV in developing countries as well as the length of time for IPV to be administered beyond certification of eradication of wild polioviruses and total OPV withdrawal. IPV policies will likely evolve and new technologies will become available to meet unforeseen needs during this historical and unprecedented public health endeavor. Pediatricians in India have a crucial role to play in this global effort by supporting the overall polio eradication strategy and ensuring that all targeted children in India receive IPV. | NAT | **JUL TO DEC** | **PMID:**27771632 |
|  | George A(1), Peter D(1), Pulimood S(1), Manipadam MT(2), George B(3), Paul MJ(4),Thomas JK(4).  Rapidly progressing necrotic ulcerations and sinuses in specific cutaneousHodgkin's disease.  Indian Dermatol Online J. 2016 Sep-Oct;7(5):436-438.  **Author information:**  (1)Department of Dermatology, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Pathology, Christian Medical College, Vellore, Tamil Nadu, India. (3)Department of Haematology, Christian Medical College, Vellore, Tamil Nadu, India. (4)Department of Surgery, Christian Medical College, Vellore, Tamil Nadu, India.  DOI: 10.4103/2229-5178.190503 | NAT | **JUL TO DEC** | **PMCID: PMC**5038116  **PMID:**27730051 |
|  | George AA(1), Peter D(1), Masih D(2), Thomas M(2), Pulimood S(1).  Cutaneous metastases from signet cell carcinoma of the gut: A report of twocases.  Indian Dermatol Online J. 2016 Jul-Aug;7(4):281-4. doi: 10.4103/2229-5178.185462.  **Author information:**  (1)Department of Dermatology, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Pathology, Christian Medical College, Vellore, Tamil Nadu, India.  Cutaneous metastasis from visceral tumors is a rare entity with a reported incidence between 0.3% and 9.8%. These usually occur late in the course of the disease; the average time interval between the diagnosis of malignancy and presentation of cutaneous metastases has been reported to be 33 months. In rare instances (in about 0.8%-1.3% of patients), cutaneous metastases may be a pointer to an underlying undiagnosed malignancy. We report two patients presenting to us with soft, nodular, cutaneous lesions, which was the manifestation of metastatic signet cell carcinoma arising from the gut. We report these cases owing to their rarity.  DOI: 10.4103/2229-5178.185462 | NAT | **JUL TO DEC** | **PMCID: PMC**4976407  **PMID:**27559503 |
|  | George AJ(1), Nair S(2), Karthic JC(3), Joseph M(2).  The incidence of deep venous thrombosis in high-risk Indian neurosurgicalpatients: Need for early chemoprophylaxis?  Indian J Crit Care Med. 2016 Jul;20(7):412-6. doi: 10.4103/0972-5229.186223.  **Author information:**  (1)Department of General Surgery, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Neurological Sciences, Christian Medical College, Vellore, Tamil Nadu, India. (3)Department of General Medicine, Changi General Hospital, Singapore City, Singapore.  INTRODUCTION: Deep venous thrombosis (DVT) is thought to be less common in Asians than in Caucasian population. The incidence of DVT in high-risk groups, especially the neurosurgical (NS) patients, has not been well studied. This leaves no firm basis for the start of early prophylactic anticoagulation within first 5 postoperative days in Indian NS patients. This is a prospective observational study to determine the early occurrence of DVT in the NS patients.  PATIENTS AND METHODS: We screened 137 consecutive high-risk NS patients based on inclusion and exclusion criteria. The femoral veins were screened using Doppler ultrasound on day 1, 3, and 5 of admission into the NS Intensive Care Unit (ICU) at tertiary center from South India.  RESULTS: Among 2887 admissions to NICU 147 patients met inclusion criteria. One hundred thirty seven were screened for DVT. There was a 4.3% (6/137) incidence of DVT with none of the six patients having signs or symptoms of pulmonary embolism. Among the risk factors studied, there was a significant association with femoral catheterization and a probable association with weakness/paraparesis/paraplegia. The mortality in the study group was 10.8% with none attributable to DVT or pulmonary embolism.  CONCLUSION: There is a low incidence of DVT among the high risk neurosurgical population evaluated within the first 5 days of admission to NICU, limiting the need for early chemical thrombo-prophylaxis in these patients. With strict protocols for mechanical prophylaxis with passive leg exercise, early mobilization and serial femoral Doppler screening, heparin anticoagulation can be restricted within the first 5 days of ICU admission in high risk patients.  DOI: 10.4103/0972-5229.186223 | NAT | **JUL TO DEC** | **PMCID: PMC**4968064  **PMID:**27555696 |
|  | Ghosh A(1), Kumar S(2), Chacko R(3), Charlu AP(4).  Total Extraction as a Treatment for Anaemia in a Patient of Glanzmann'sThrombasthenia with Chronic Gingival Bleed: Case Report.  J Clin Diagn Res. 2016 Jan;10(1):ZD11-2. doi: 10.7860/JCDR/2016/16383.7123. Epub2016 Jan 1.  **Author information:**  (1)Fellow, Head and Neck Oncology, HCG Cancer Centre , (Previously Fellow at CMC Vellore), Ahmedabad, India . (2)Assistant Professor, Department of Oral and Maxillofaical Surgery, Christian Medical College and Hospital , Vellore, Tamil Nadu, India . (3)Head of Department Unit I, Department of Oral and Maxillofacial Surgery, Christian Medical College and Hospital , Vellore, Tamil Nadu, India . (4)Associate Professor, Department of Oral and Maxillofacial Surgery, Christian Medical College and Hospital , Vellore, Tamil Nadu, India .  Glanzmann's Thrombasthenia (GT) is a rare autosomal recessive bleeding disorder affecting the megakaryocyte lineage and is characterized by lack of platelet aggregation on stimulation. The molecular basis is linked to quantitative and qualitative abnormalities of αIIbβ3 integrin. Most of the patients with severe Glanzmann's thrombasthenia have spontaneous gum bleeding and persistent low haemoglobin levels. Often these patients are addressed with local haemostatic measures and platelet coverage. We report a case of a severe Glanzmann's thrombasthenia with chronic gingivitis and associated spontaneous gum bleed with chronic low haemoglobin levels, managed subsequently with total dental extraction under appropriate platelet and recombinant factor VIIa coverage. Further follow up of the patient substantiated the treatment protocol with increased and stable haemoglobin levels, thus emphasizing the need for total dental extraction in patients with severe Glanzmann's with chronic spontaneous gum bleed, as a definitive treatment option, which has not been reported so far in the literature. DOI: 10.7860/JCDR/2016/16383.7123 | NAT | **JAN TO JUN** | **PMCID: PMC**4740716  **PMID:**26894187 |
|  | Ghosh GC(1), Sharma B(2).  Hypoglossal palsy in a case of cavernous sinus thrombosis.  Neurol India. 2016 Nov-Dec;64(6):1316-1318. doi: 10.4103/0028-3886.193802.  **Author information:**  (1)Department of Cardiology, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Medicine, PGIMER and Dr. RML Hospital, New Delhi, India.  DOI: 10.4103/0028-3886.193802 | NAT | **JUL TO DEC** | **PMID:**27841209 |
|  | Gnanasekaran KK, Chacko MP(1), Manipadam MT, Bindra MS, George B, Srivastava VM.  Acute monoblastic leukemia with abnormal eosinophils and inversion (16): A rareentity.  Indian J Pathol Microbiol. 2016 Jan-Mar;59(1):104-6. doi:10.4103/0377-4929.174829.  **Author information:**  (1)Department of Transfusion Medicine and Immunohematology, Christian Medical College, Vellore, Tamil Nadu, India.  Acute myeloid leukemia (AML) is a malignant hematopoietic stem cell disorder which is sub-classified based on bone marrow morphology and the presence of specific genetic abnormalities. One such cytogenetic abnormality is the pericentric inversion (inv) of chromosome 16 which is typically seen in AML M4 with eosinophilia and is associated with a favorable prognosis. We report the inv (16) in a young woman with AML M5 and abnormal eosinophils. This is a rare entity with only about 20 cases being reported till date. DOI: 10.4103/0377-4929.174829 | NAT | **JAN TO JUN** | **PMID:**26960652 |
|  | Godson HF(1), Ravikumar M(2), Sathiyan S(2), Ganesh KM(2), Ponmalar YR(1),Varatharaj C(2).  Analysis of small field percent depth dose and profiles: Comparison ofmeasurements with various detectors and effects of detector orientation withdifferent jaw settings.  J Med Phys. 2016 Jan-Mar;41(1):12-20. doi: 10.4103/0971-6203.177284.  **Author information:**  (1)Department of Radiation Physics, Kidwai Memorial Institute of Oncology, Bengaluru, Karnataka, India; Department of Radiotherapy, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Radiation Physics, Kidwai Memorial Institute of Oncology, Bengaluru, Karnataka, India.  The advent of modern technologies in radiotherapy poses an increased challenge in the determination of dosimetric parameters of small fields that exhibit a high degree of uncertainty. Percent depth dose and beam profiles were acquired using different detectors in two different orientations. The parameters such as relative surface dose (D S), depth of dose maximum (D max), percentage dose at 10 cm (D 10), penumbral width, flatness, and symmetry were evaluated with different detectors. The dosimetric data were acquired for fields defined by jaws alone, multileaf collimator (MLC) alone, and by MLC while the jaws were positioned at 0, 0.25, 0.5, and 1.0 cm away from MLC leaf-end using a Varian linear accelerator with 6 MV photon beam. The accuracy in the measurement of dosimetric parameters with various detectors for three different field definitions was evaluated. The relative D S(38.1%) with photon field diode in parallel orientation was higher than electron field diode (EFD) (27.9%) values for 1 cm ×1 cm field. An overestimation of 5.7% and 8.6% in D 10 depth were observed for 1 cm ×1 cm field with RK ion chamber in parallel and perpendicular orientation, respectively, for the fields defined by MLC while jaw positioned at the edge of the field when compared to EFD values in parallel orientation. For this field definition, the in-plane penumbral widths obtained with ion chamber in parallel and perpendicular orientation were 3.9 mm, 5.6 mm for 1 cm ×1 cm field, respectively. Among all detectors used in the study, the unshielded diodes were found to be an appropriate choice of detector for the measurement of beam parameters in small fields. DOI: 10.4103/0971-6203.177284 | NAT | **JAN TO JUN** | **PMCID: PMC**4795411  **PMID:**27051165 |
|  | Goel A(1), Christudoss P(2), George R(3), Ramakrishna B(4), Amirtharaj GJ(5),Keshava SN(6), Ramachandran A(5), Balasubramanian KA(5), Mackie I(7), FlemingJJ(2), Elias E(1,)(8), Eapen CE(9).  Arsenicosis, possibly from contaminated groundwater, associated with noncirrhoticintrahepatic portal hypertension.  Indian J Gastroenterol. 2016 May;35(3):207-15. doi: 10.1007/s12664-016-0660-1.Epub 2016 May 26.  **Author information:**  (1)Department of Hepatology, Christian Medical College, Vellore, 632 004, India. (2)Department of Clinical Biochemistry, Christian Medical College, Vellore, 632 004, India. (3)Department of Dermatology, Christian Medical College, Vellore, 632 004, India. (4)Department of Pathology, Christian Medical College, Vellore, 632 004, India. (5)Wellcome Trust Research Laboratory, Christian Medical College, Vellore, 632 004, India. (6)Department of Radiology, Christian Medical College, Vellore, 632 004, India. (7)Haemostasis Research Unit, Haematology Department, University College London, London, UK. (8)University Hospital Birmingham, Birmingham, UK. (9)Department of Hepatology, Christian Medical College, Vellore, 632 004, India. [eapen@cmcvellore.ac.in](mailto:eapen@cmcvellore.ac.in).  BACKGROUND AND AIMS: Idiopathic noncirrhotic intrahepatic portal hypertension (NCIPH), a chronic microangiopathy of the liver caused by arsenicosis from use of contaminated groundwater, was reported from Asia. This study aimed to see, if in the twenty-first century, arsenicosis was present in NCIPH patients at our hospital and, if present, to look for groundwater contamination by arsenic in their residential locality. METHODS: Twenty-seven liver biopsy proven NCIPH patients, 25 portal hypertensive controls with hepatitis B or C related cirrhosis and 25 healthy controls, matched for residential locality, were studied. Eighty-four percent to 96 % of study subjects belonged to middle or lower socioeconomic category. Arsenicosis was looked for by estimation of arsenic levels in finger/toe nails and by skin examination. Arsenic levels in nails and in ground water (in NCIPH patients with arsenicosis) was estimated by mass spectrometry. RESULTS: Nail arsenic levels were raised in five (10 %) portal hypertensive study subjects [two NCIPH patients (both had skin arsenicosis) and three portal hypertensive controls]. All of these five patients were residents of West Bengal or Bangladesh. Skin arsenicosis was noted in three NCIPH patients (11 %) compared to none of disease/healthy controls. Ground water from residential locality of one NCIPH patient with arsenicosis (from Bangladesh) showed extremely high level of arsenic (79.5 μg/L). CONCLUSIONS: Arsenicosis and microangiopathy of liver, possibly caused by environmental contamination continues in parts of Asia. Further studies are needed to understand the mechanisms of such 'poverty-linked thrombophilia'. DOI: 10.1007/s12664-016-0660-1 | NAT | **JAN TO JUN** | **PMID:**27225799 |
|  | Gopi T, Ranjith J, Anandan S, Balaji V(1).  Epidemiological characterization of Streptococcus pneumoniae from India usingmultilocus sequence typing.  Indian J Med Microbiol. 2016 Jan-Mar;34(1):17-21. doi: 10.4103/0255-0857.174113.  **Author information:**  (1)Department of Clinical Microbiology, Christian Medical College and Hospital, Vellore - 632 004, Tamil Nadu, India.  OBJECTIVE: The aim of this study was to utilize the multilocus sequence typing (MLST) technique to characterise Streptococcus pneumoniae among clinical isolates in India. MLST was used to determine clonality, to establish genetic relatedness, to check for correlation between serotypes and sequence types (STs) and its relevance associated with antibiotic resistance. METHODS: Forty consecutive invasive S. pneumoniae isolates in children<5 years were characterised. Preliminary identification of serotype and antibiotic susceptible profile was followed with MLST technique to identify the STs of the isolates. STs were then analysed for clonality using an eBURST algorithm and genetic relatedness using Sequence Type Analysis and Recombinational Tests version 2 software. RESULTS: The most common ST was ST63. Among the forty isolates, we identified nine novel STs, six of which had known alleles but in new combinations, three of which had new alleles in their sequence profile. The new STs assigned were 8501-8509. One clonal complex was found among the 40 strains characterised. The most common serotypes in this study were serotype 19F, 14 and 5. Non-susceptibility to penicillin and erythromycin was observed in 2.5% and 30% of the isolates, respectively. CONCLUSION: This study shows a significant number of novel STs among the 40 isolates characterised (9/40, 22.5%), however, internationally recognised strains were also circulating in India, indicating, there could be greater geographical variation in pneumococcal STs in India. Molecular epidemiology data is essential to understand the population dynamics of S. pneumoniae in India before the introduction of pneumococcal vaccines in NIP in India. DOI: 10.4103/0255-0857.174113 | NAT | **JAN TO JUN** | **PMID:**26776113 |
|  | Gupta A(1), Moorthy RK(1), Prabhu AJ(2), Rajshekhar V(1).  Lumbar paraspinal primary high-grade leiomyosarcoma mimicking an extraforaminalschwannoma.  Neurol India. 2016 Sep-Oct;64(5):1071-4. doi: 10.4103/0028-3886.190226.  **Author information:**  (1)Department of Neurological Sciences, Christian Medical College Hospital, Vellore, Tamil Nadu, India. (2)Department of Pathology, Christian Medical College Hospital, Vellore, Tamil Nadu, India.  DOI: 10.4103/0028-3886.190226 | NAT | **JUL TO DEC** | **PMID:**27625268 |
|  | Gupta A, Rajshekhar V(1).  Functional and radiological outcome in patients undergoing three level corpectomyfor multi-level cervical spondylotic myelopathy and ossified posteriorlongitudinal ligament.  Neurol India. 2016 Jan-Feb;64(1):90-6. doi: 10.4103/0028-3886.173654.  **Author information:**  (1)Department of Neurological Sciences, Christian Medical College Hospital, Vellore, Tamil Nadu, India.  BACKGROUND: To review our experience with patients undergoing 3 level cervical central corpectomy (CC) with un-instrumented fibular autograft fusion. MATERIALS AND METHODS: This is a retrospective study, involving 33 patients with cervical spondylotic myelopathy (CSM) or ossified posterior longitudinal ligament (OPLL) who underwent a 3 level CC between 2002 and 2010. The patients were followed up clinically and radiologically. Their functional status was assessed using Nurick's grading system. Parameters such as intraoperative complications, segmental curvature of the cervical spine, graft subsidence, graft fusion and functional outcome of these patients were assessed. RESULTS: There was transient morbidity in 28.6% of patients, with no permanent morbidity or mortality. We obtained follow up in 29 patients (87.9%) with a mean duration of follow up of 65.1 months (range, 12 to 138 months). The mean difference of segmental cervical curvature on follow up was 3.600 and the average graft subsidence was 5.70 mm. We achieved a fusion rate of 90%. There was no instance of graft extrusion in our series. There was a significant improvement in the functional status of our patients (from Nurick grade 3.55 to 2.42; P = 0.0001), with no clinical deterioration in any patient. CONCLUSIONS: Three level cervical corpectomy with un-instrumented fusion is a relatively safe surgery in experienced hands, and can achieve excellent clinical and radiological outcomes. DOI: 10.4103/0028-3886.173654 | NAT | **JAN TO JUN** | **PMID:**26754998 |
|  | Gupta N(1), Chacko G(1), Chacko AG(2), Rajshekhar V(2), Jayprakash M(3).  Fluorescence in situ hybridization for chromosome 14q deletion in subsets ofmeningioma segregated by MIB-1 labelling index.  Neurol India. 2016 Nov-Dec;64(6):1256-1263. doi: 10.4103/0028-3886.193768.  **Author information:**  (1)Department of General Pathology, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Neurological Sciences, Christian Medical College, Vellore, Tamil Nadu, India. (3)Division of Gastrointestinal Sciences, Christian Medical College, Vellore, Tamil Nadu, India.  AIM: To correlate histopathological grading of meningiomas segregated into subgroups based on the MIB-1 labelling index (MIB-1 LI) with chromosomal loss of 14q using fluorescence in situ hybridization (FISH).  SETTINGS AND DESIGN: Retrospective study conducted in a tertiary hospital.  METHODS AND MATERIAL: Forty-six cases from January to December 2011 were segregated into 5 categories based on the MIB-1 LI. Slides were reviewed to ascertain the grade. Immunohistochemical staining for MIB-1 was performed using a Ventana Benchmark XT autostainer. Commercially available FISH paraffin pretreatment kit and SpectrumOrange fluorophore labelled probe were used. The Statistical Package for the Social Sciences version 16.0 for Windows was used for statistical analysis.  RESULTS: There were 21 World Health Organisation (WHO) grade I, 24 grade II, and 1 grade III meningiomas. There was a statistically significant difference between the mean duration of symptoms, maximum dimension, and the MIB-1 LI of grade I and grade II meningiomas. 33.3% grade I cases showed 14q deletion, compared to 84% of grade II and III meningiomas. Histologically, hypercellularity, small cell formation, prominent nucleoli, and sheet-like growth were significantly associated with 14q deletion. All brain invasive meningiomas had 14q deletion. As MIB-1% increased, the prevalence of deletions was significantly higher. The mean MIB-1 of the 7 grade I meningiomas that had 14q deletions was 8.86 ± 1.95% when compared to 4.14 ± 1.35% for those without 14q deletions.  CONCLUSIONS: A strong association existed between histologic grade, MIB-1 LI, and the presence of chromosome 14q deletion. Association of high MIB-1 LI with 14q deletions, even in meningiomas with a Grade I histology, defines a distinct subset of benign meningiomas.  DOI: 10.4103/0028-3886.193768 | NAT | **JUL TO DEC** | **PMID:**27841196 |
|  | Gupta N(1), Giri S(2), Rathi V(3), Ranga GS(2).  Flow Mediated Dilatation, Carotid Intima Media Thickness, Ankle Brachial PressureIndex and Pulse Pressure in Young Male Post Myocardial Infarction Patients inIndia.  J Clin Diagn Res. 2016 Oct;10(10):OC35-OC39. Epub 2016 Oct 1.  **Author information:**  (1)Senior Resident, Department of Rheumatology, CMC , Vellore, Tamilnadu, India . (2)Professor, Department of Medicine, University College of Medical Sciences , Dilshad Garden, Delhi, India . (3)Professor, Department of Radio-Diagnosis, University College of Medical Sciences , Dilshad Garden, Delhi, India .  INTRODUCTION: Due to increase in Coronary Artery Disease (CAD) at a younger age, we should try to diagnose atherosclerotic process and population at risk, at the earliest. Flow Mediated Dilatation (FMD), Carotid Intima-Media Thickness (CIMT) and Ankle-Brachial Pressure Index (ABI) are probable markers for early atherosclerosis and may be useful in coronary risk stratification.  AIM: To compare and correlate the FMD, CIMT, ABI and Pulse Pressure (PP) in young male patients of Myocardial Infarction (MI) with age and sex matched healthy controls.  MATERIALS AND METHODS: Eighty male patients of MI aged ≤45 years, who presented to the Cardiac Care Unit and Department of Medicine of Guru Teg Bahadur Hospital, Delhi, India, from November 2010 to April 2012 were recruited consecutively for this case control study and same number of age and sex matched healthy controls were also analyzed. Six weeks after MI, FMD of the brachial artery, intima media thickness of carotid artery, ABPI and PP were measured in the cases and compared with healthy controls.  RESULTS: The FMD was lower among young patients of MI than controls (p<0.001). CIMT was higher among cases than controls (p=0.001). ABI was lower among cases than controls (p<0.001). Compared to controls, PP was higher among cases (p=0.001). In all subjects, a negative correlation between FMD and CIMT (r=-0.220, p=0.005) and a positive correlation between FMD and ABPI (r=0.304, p<0.001) was found. A statistically significant negative correlation was found between endothelial dependent FMD and PP among cases and control groups (r=-0.209, p=0.007).  CONCLUSION: Biophysical parameters were deranged in young post MI patients. Majority of our young male patients fell in low risk Framingham risk score but still they manifested with CAD. Despite six weeks of treatment among young male patients of MI, various biophysical parameters were still deranged.  DOI: 10.7860/JCDR/2016/20872.8751 | NAT | **JUL TO DEC** | **PMCID: PMC**5121713  **PMID:**27891375 |
|  | Gupta V(1), Job V, Thomas N.  Effect of Fortification and Additives on Breast Milk Osmolality.  Indian Pediatr. 2016 Feb;53(2):167-9.  **Author information:**  (1)Department of Neonatology and Clinical Biochemistry, Christian Medical College, Vellore, Tamil Nadu, India. [niranjan@cmcvellore.ac.in](mailto:niranjan@cmcvellore.ac.in).  This study evaluated the effect of fortification and commonly used additives on the osmolality of human milk. Osmolality after fortification with milk powder and human milk fortifier increased from 303 mOsmol/kg to 397 and 373 mOsmol/kg, respectively. The maximal increase in osmolality was seen with the addition of calcium gluconate. | NAT | **JAN TO JUN** | **PMID:**26897157 |
|  | Gururani K(1), Jose J(2), George PV(2).  Testosterone as a marker of coronary artery disease severity in middle aged males.  Indian Heart J. 2016 Dec;68 Suppl 3:S16-S20. doi: 10.1016/j.ihj.2016.07.002. Epub  2016 Aug 8.  **Author information:**  (1)Department of Cardiology, Christian Medical College Hospital, Vellore, India. Electronic address: drgururanik@gmail.com. (2)Department of Cardiology, Christian Medical College Hospital, Vellore, India.  Historically, higher levels of serum testosterone were presumed deleterious to the cardiovascular system. In the last two decades, studies have suggested that low testosterone levels are associated with increased prevalence of risk factors for cardiovascular disease (CVD), including dyslipidemia and diabetes. This is a cross sectional study. The aim of our study was to determine the relationship between serum testosterone levels and angiographic severity of coronary artery disease (CAD). Serum testosterone levels were also correlated with flow mediated dilation of brachial artery (BAFMD) - an indicator of endothelial function. Consecutive male patients, aged 40-60 years, admitted for coronary angiography (CAG) with symptoms suggestive of CAD, were included in the study. Out of the 92 patients included in the study, 32 patients had normal coronaries and 60 had CAD on coronary angiography. Severity of CAD was determined by Gensini coronary score. The group with CAD had significantly lower levels of total serum testosterone (363±147.1 vs 532.09±150.5ng/dl, p<0.001), free testosterone (7.1215±3.012 vs 10.4419±2.75ng/dl, p<0.001) and bioavailable testosterone (166.17±64.810 vs 247.94±62.504ng/dl, p<0.001) when compared to controls. Adjusting for the traditional risk factors for CAD, a multiple linear regression analysis showed that low testosterone was an independent predictor of severity of CAD (β=-0.007, p<0.001). This study also showed that levels of total, free and bioavailable testosterone correlated positively with BAFMD %. Copyright © 2016. Published by Elsevier B.V.  DOI: 10.1016/j.ihj.2016.07.002 | NAT | **JUL TO DEC** | PMID: 28038719 PMCID: PMC5198878 [Available on 2017-12-01] |
|  | Inbaraj LR(1), Rose A(2), George K(2), Bose A(2).  Incidence and Impact of Unintentional Childhood Injuries: A Community Based Studyin Rural South India.  Indian J Pediatr. 2016 Nov 19. [Epub ahead of print]  **Author information:**  (1)Department of Community Health, Bangalore Baptist Hospital, Bangalore, Karnataka, 560024, India. leeberk2003@gmail.com. (2)Department of Community Health, Christian Medical College, Vellore, Tamil Nadu, India.  OBJECTIVE: To estimate the incidence of unintentional childhood injuries and to assess the impact of injury during childhood.  METHODS: This is a cross sectional study, conducted in 13 clusters of a rural block in Vellore. Children were screened by two-stage cluster sampling method by two weeks and three months recall method. The primary caregivers of injured children were administered a questionnaire to assess the impact of the injury.  RESULTS: Childhood injury related morbidity was 292.5 per 1000 y. Children between 10 and 14 y (4.6%) and boys (4.5%) had a higher rate of injury. Fall (43.1 %) was the most common cause of injury followed by RTIs (Road Traffic Incidents- 27.6%). Work absenteeism for primary caregivers ranged from 1 to 60 (IQR 2-7) days. Sickness absenteeism ranged from 1 to 45 d with a mean of 7.64 (IQR 2-7) days. Half of the children missed school after an injury. The days spent with temporary disability ranged from 1 to 60 d with a mean of 11.79 (IQR 2-7) d and 7.73% had permanent disability.  CONCLUSIONS: Unintentional childhood injury is a neglected public health problem which leads to sickness absenteeism and disability. Boys and older children are the most common victims of injury. There is a need for establishing state or nationwide injury registries to help understand accurate estimates of disability-adjusted life year (DALY) and loss of productivity.  DOI: 10.1007/s12098-016-2260-6 | NAT | **JUL TO DEC** | **PMID:**27864749 |
|  | Irodi A(1), Leena RV(1), Prabhu SM(2), Gibikote S(3).  Role of Computed Tomography in Pediatric Chest Conditions.  Indian J Pediatr. 2016 Jul;83(7):675-90. doi: 10.1007/s12098-015-1955-4. Epub2016 Feb 26.  **Author information:**  (1)Department of Radiology, Christian Medical College, Vellore, 632004, Tamil Nadu, India. (2)Department of Radiology, SSM Superspeciality Hospital, Hassan, Karnataka, India. (3)Department of Radiology, Christian Medical College, Vellore, 632004, Tamil Nadu, India. gibikote@cmcvellore.ac.in.  CT is the preferred cross-sectional imaging modality for detailed evaluation of anatomy and pathology of the lung and tracheobronchial tree, and plays a complimentary role in the evaluation of certain chest wall, mediastinal, and cardiac abnormalities. The article provides an overview of indications and different types of CT chest, findings in common clinical conditions, and briefly touches upon the role of each team member in optimizing and thus reducing radiation dose.  DOI: 10.1007/s12098-015-1955-4 | NAT | **JUL TO DEC** | **PMID:**26916888 |
|  | Isaac BT(1), Datey A(2), Christopher DJ(3).  Successful removal of self-expanding metallic stent after deployment fortubercular bronchostenosis.  Indian J Tuberc. 2016 Jan;63(1):55-8. doi: 10.1016/j.ijtb.2015.07.013. Epub 2016May 4.  **Author information:**  (1)Assistant Professor, Department of Pulmonary Medicine, Christian Medical College, Vellore, India. Electronic address: barneyisaac98@gmail.com. (2)Research Officer, Department of Pulmonary Medicine, Christian Medical College, Vellore, India. (3)Professor, Department of Pulmonary Medicine, Christian Medical College, Vellore, India.  The use of metallic stents is traditionally not recommended for benign tracheobronchial conditions. With advances in the field of interventional bronchoscopy, metal tracheobronchial stents have occasionally been used to treat benign disease. However, the removal of these stents from the airway is technically difficult. We are reporting the case of a young female subject who received a self-expanding metallic stent for alleviation of post-tubercular bronchostenosis, which was successfully removed after two months without complications. Metal stents can be used in benign tracheobronchial conditions but require meticulous follow-up to monitor complications. Experienced operators can remove them without major complications and this may be life-saving in emergencies. We are reporting this case for the rarity of such procedures in India. Copyright © 2015 Tuberculosis Association of India. Published by Elsevier B.V. All rights reserved. DOI: 10.1016/j.ijtb.2015.07.013 | NAT | **JAN TO JUN** | **PMID:**27235947 |
|  | Isaac R(1).  Early natural menopause - a marker of adverse life situations in women across the world: Not unique in Indian women.  Indian J Med Res. 2016 Sep;144(3):317-318. doi: 10.4103/0971-5916.198680.  **Author information:**  (1)Department of RUHSA, Christian Medical College, Vellore 632 209, Tamil Nadu, India. DOI: 10.4103/0971-5916.198680 | NAT | **JUL TO DEC** | PMID: 28139529 |
|  | Ishitha G(1), Manipadam MT(2), Backianathan S(3), Chacko RT(4), Abraham DT(5),Jacob PM(6).  Clinicopathological Study of Triple Negative Breast Cancers.  J Clin Diagn Res. 2016 Sep;10(9):EC05-EC09. Epub 2016 Sep 1.  **Author information:**  (1)Assistant Professor, Department of Pathology, CMC , Vellore, Tamil Nadu, India . (2)Professor, Department of Pathology, CMC , Vellore, Tamil Nadu, India . (3)Professor and Head of Department, Department of Radiation Therapy, CMC , Vellore, Tamil Nadu, India . (4)Professor and Head of Department, Department of Medical Oncology, CMC , Vellore, Tamil Nadu, India . (5)Professor, Department of Endocrine Surgery, CMC , Vellore, Tamil Nadu, India . (6)Professor and Head, Department of Endocrine Surgery, CMC , Vellore, Tamil Nadu, India .  INTRODUCTION: Triple Negative Breast Cancers (TNBC) are a subset of breast cancers which are composed of different molecular subtypes. The most common is the basal like subtype, which has an adverse prognosis and limited treatment options.  AIM: This study was undertaken to assess the clinico-pathologic and immunohistochemical subtypes of triple negative breast cancers and assess how each of these subtypes correlate with clinical behaviour and survival outcomes.  MATERIALS AND METHODS: Fifty-three (22.2%) of 238 cases of primary invasive breast carcinomas diagnosed from January 2010 to June 2011 were found to be negative for immunohistochemical markers- ER, PR and HER2. These fifty three cases were included in the study and were classified into four histological subtypes proposed by Ishikawa et al. Basal markers- CK5/6, EGFR and CK14 were done on these cases and they were further classified immunohistochemically into basal and non basal subtypes. The morphological features, disease free survival and overall survival were evaluated for both basal and non basal subtypes.  RESULTS: Majority (96%) of TNBC cases were classified according to WHO as invasive ductal carcinoma (NOS). Type C Ishikawa histological subtype was found to be the commonest subtype in both basal and non-basal TNBC. Of 53 TNBC cases, basal immunohistochemical markers were performed on 47 cases only because of paucity of tissue. Of these 47 cases, thirty-five (74.4%) were found to be of basal like subtype and all these cases were picked up by a combination of CK5/6 and EGFR.  CONCLUSION: High grade morphological features, hormonal markers with additional use of basal markers can help identify the basal like subtype of TNBC, thereby predicting breast cancer survival. The combination of CK5/6 and EGFR identified all cases of basal subtype. EGFR in addition also has potential therapeutic implications. The morphological features and survival outcomes were not significantly different between basal and non-basal phenotypes.  DOI: 10.7860/JCDR/2016/20475.8539 | NAT | **JUL TO DEC** | **PMCID: PMC**5071942  **PMID:**27790442 |
|  | Jacob A(1), Thomas L(1), Stephen K(1), Marconi S(1), Noel J(2), Jacob KS(2),Prasad J(1).  Nutritional status and intellectual development in children: A community-basedstudy from rural Southern India.  Natl Med J India. 2016 Mar-Apr;29(2):82-4.  **Author information:**  (1)Department of Community Health, Christian Medical College, Vellore 632002, Tamil Nadu, India. (2)Department of Psychiatry, Christian Medical College, Vellore 632002, Tamil Nadu, India.  BACKGROUND: There is a dearth of recent data on the relationship between nutritional status and intellectual development among children in India. To determine whether such a relationship exists, we studied children in a rural area of Tamil Nadu. METHODS: We stratified villages in Kaniyambadi block, Tamil Nadu, and recruited consecutive children who satisfied the study criteria. We assessed nutritional status by measuring height and weight and recording chronological age, and calculated indices weight-for-age, height-for-age, weight-forheight and their Z scores. We assessed intellectual development using the Indian adaptation of the Vineland Social Maturity Scale. We used a case-control framework to determine the relationship and logistic regression to adjust for common confounders. RESULTS: We recruited 114 children between the ages of 12 and 72 months. Z score means (weight-for-age -1.36; height-for-age -1.42; weight-for-height -0.78) were much less than 0 and indicate undernutrition. Z score standard deviations (weight-for-age 1.04; height-for-age 1.18; weightfor- height 1.06) were within the WHO recommended range for good quality of nutrition data suggesting reduced measurement errors and incorrect reporting of age. The frequency distributions of population Z scores suggest high undernutrition, wasting and medium stunting. A tenth of the population (9.6%) had values to suggest borderline/below average intelligence (social quotient <89). Lower height-forage, height-for-age Z score and weight-for-height Z score were significantly associated with a lower social quotient. These relationships remained statistically significant after adjusting for sex and socioeconomic status using logistic regression. CONCLUSION: Chronic undernutrition, wasting and stunting and their association with lower intellectual development demand an urgent re-assessment of national food policies and programmes. | NAT | **JAN TO JUN** | **PMID:**27586211 |
|  | Jacob J(1), Joseph TK, Srinivasan R, Kompithra RZ, Simon A, Kang G.  Direct and Indirect Costs of Pediatric Gastroenteritis in Vellore, India.  Indian Pediatr. 2016 Jul 8;53(7):642-4.  **Author information:**  (1)Division of Gastrointestinal Sciences, and JUL TO DECDepartment of Child Health; Christian Medical College, Vellore, Tamil Nadu, India. Correspondence to: Dr Gagandeep Kang, Division of Gastrointestinal Sciences, Christian Medical College, Vellore, TN 632 004, India. gkang@cmcvellore.ac.in.  OBJECTIVE: To determine costs of pediatric gastroenteritis in out-patient and in-patient facilities.  METHODS: Cross-sectional survey of children with acute gastroenteritis attending out-patient clinic (n=30) or admitted in the ward (n=30) for management in the Christian Medical College, Vellore, India from July-September 2014 to estimate direct (drugs, tests, consultation/hospitalization) and indirect (travel, food, lost wages) costs associated with the episode.  RESULTS: Median direct and indirect costs were Rs 590 and Rs 190 for out-patient management and Rs 7258 and Rs. 610 for hospitalization, constituting 1.1% and 11% of median annual household income, respectively.  CONCLUSIONS: Escalating healthcare costs need tracking for evaluation of interventions. | NAT | **JUL TO DEC** | **PMID:**27508545 |
|  | Jacob KS(1).  Insight in Psychosis: An Indicator of Severity of Psychosis, an Explanatory Modelof Illness, and a Coping Strategy.  Indian J Psychol Med. 2016 May-Jun;38(3):194-201. doi: 10.4103/0253-7176.183078.  **Author information:**  (1)Department of Psychiatry, Christian Medical College, Vellore, Tamil Nadu, India.  Recent studies related to insight, explanatory models (EMs) of illness and their relationship to outcome of psychosis are reviewed. The traditional argument that insight predicts outcome in psychosis is not supported by recent longitudinal data, which has been analyzed using multivariable statistics that adjust for severity and quality of illness. While all cognition will have a neurobiological representation, if "insight" is related to the primary psychotic process, then insight cannot be seen as an independent predictor of outcome but a part of the progression of illness. The evidence suggests insight, like all EMs, is belief which interacts with the trajectory of the person's illness and the local culture to produce a unique understanding of the illness for the particular individual and his/her family. DOI: 10.4103/0253-7176.183078 | NAT | **JAN TO JUN** | **PMCID: PMC**4904754  **PMID:**27335513 |
|  | Jacob KS(1).  Robert Spitzer and psychiatric classification: technical challenges and ethicaldilemmas.  Indian J Med Ethics. 2016 Apr-Jun;1(2):95-100.  **Author information:**  (1)Professor of Psychiatry, Christian Medical College, Vellore, Tamil Nadu 632 002, India,. [ksjacob@cmcvellore.ac.in](mailto:ksjacob@cmcvellore.ac.in).  Dr Robert Leopold Spitzer (May 22, 1932-December 25, 2015), the architect of modern psychiatric diagnostic criteria and classification, died recently at the age of 83 in Seattle. Under his leadership, the American Psychiatric Association's (APA) Diagnostic and Statistical Manuals (DSM) became the international standard. | NAT | **JAN TO JUN** | **PMID:**27260820 |
|  | Jacob KS(1).  Movement for Global Mental Health: The crusade and its critique.  Natl Med J India. 2016 Sep-Oct;29(5):290-292.  (1)Department of Psychiatry, Christian Medical College, Vellore 632004, Tamil Nadu, India. | NAT | **JUL TO DEC** | PMID: 28098086 |
|  | Jacob KS(1).  Reducing Suicide Rates: Need for Public Health and Population Interventions.  Indian J Psychol Med. 2016 Nov-Dec;38(6):510-513. doi: 10.4103/0253-7176.194915.  **Author information:**  (1)Department of Psychiatry, Christian Medical College, Vellore, Tamil Nadu, India.  Recent studies from India have challenged the fact that the majority of the people who die by suicide have severe mental illness; they have demonstrated its frequent links to environmental stress, social, cultural, economic, and political correlates. Suicide, a complex phenomenon, is a final common pathway for a variety of causal etiologies. Nevertheless, psychiatry continues to argue for curative solutions based on the reductionistic biomedical model, rather than support public health measures to manage the larger sociocultural, economic, and political context. While psychiatry and curative medicine help many people in distress, specific mental health interventions are unlikely to impact secular trends in the rates of suicide. The reduction of population rates of suicide requires a range of public health measures.  DOI: 10.4103/0253-7176.194915 | NAT | **JUL TO DEC** | PMID: 28031584 PMCID: PMC5178032 |
|  | Jacob M(1), Jacob KS(2).  Medicine, medical writing, and India.  Indian J Psychiatry. 2016 Jul-Sep;58(3):332-335. doi: 10.4103/0019-5545.191993.  **Author information:**  (1)Department of Biochemistry, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Psychiatry, Christian Medical College, Vellore, Tamil Nadu, India.  DOI: 10.4103/0019-5545.191993 | NAT | **JUL TO DEC** | PMID: 28066014  PMCID: PMC5100128 |
|  | Jeba J(1), Jacob A(1), Kandasamy R(1), George R(1).  The patient who 'must not be told': demographic factors associated with collusionin a retrospective study in South India.  Postgrad Med J. 2016 Apr 20. pii: postgradmedj-2015-133850.  doi:10.1136/postgradmedj-2015-133850. [Epub ahead of print]  **Author information:**  (1)Palliative Care Unit, Christian Medical College and Hospital, Vellore, Tamil Nadu, India.  BACKGROUND: Patients with cancer need adequate information about diagnosis, treatment options, and possible outcomes and prognosis to make therapeutic decisions. In cultures where the family plays the dominant role in healthcare decisions, doctors are often requested to collude in withholding distressing information from the patient. This challenging situation has not been well studied and there is limited knowledge on the different factors that may contribute to collusion. OBJECTIVE: To study the prevalence of collusion among adult cancer patients attending a palliative care outpatient clinic and the contributing factors. METHODS: The healthcare records of 306 adult cancer patients who had visited the palliative care outpatient clinic at least three times with follow-up until death were retrospectively reviewed. Details on information shared and why it was not shared were retrieved from the documentation in the communication sheet in the patient chart. The prevalence, sociodemographic and clinical factors that could contribute to collusion in doctor-patient communication were studied. RESULTS: Collusion was present in 40% of cases at the time of referral to the palliative care outpatient clinic (collusion regarding diagnosis in 18%; collusion regarding prognosis in 40%). Collusion was later addressed in 35%. Collusion was significantly higher among female patients (p=0.005), manual workers (p=0.035), those not accompanied by a spouse (p=0.000) and with no oncological treatment (p=0.001). CONCLUSIONS: Collusion regarding diagnosis or prognosis is common among cancer patients referred for palliative care. It was more prevalent among female patients, manual workers, patients who had not received oncological treatment, and patients not accompanied by a spouse. Published by the BMJ Publishing Group Limited. For permission to use (where not already granted under a licence) please go to <http://www.bmj.com/company/products-services/rights-and-licensing/> DOI: 10.1136/postgradmedj-2015-133850 | NAT | **JAN TO JUN** | **PMID:**27099298 |
|  | Jegaraj MK(1), Mitra S(2), Kumar S(2), Selva B(2), Pushparaj M(2), Yadav B(3),Prabhakar AK(2), Reginald A(2).  Profile of deliberate self-harm patients presenting to Emergency Department: Aretrospective study.  J Family Med Prim Care. 2016 Jan-Mar;5(1):73-6. doi: 10.4103/2249-4863.184627.  **Author information:**  (1)Department of Family Medicine, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Emergency Medicine, Christian Medical College, Vellore, Tamil Nadu, India. (3)Department of Biostatistics, Christian Medical College, Vellore, Tamil Nadu, India.  BACKGROUND: Deliberate self-harm (DSH) is a major under-recognized epidemic in the low- and middle-income countries. This is a large retrospective study form the Emergency Department (ED) of Tertiary Care Center of South India to describe the clinicodemographic features of DSH cases. MATERIALS AND METHODS: This is a retrospective study conducted at ED of Christian Medical College, Vellore, India from January 01, 2011 to December 31, 2013. All cases of DSH were included in the study. The demographic details, mode of DSH and clinical outcome were extracted from the electronic medical record. Descriptive statistics are presented. Chi-square test was used to compare categorical variables. For all tests, a two-sided P ≤ 0.05 was considered statistically significant. RESULTS: Total of 1228 patients were admitted to ED for DSH during the study period. Male and female occurred in equal ratio. More than half of the cases occurred among age group below 30 years. Consumption of pesticides (agricultural chemicals) was the single most common mode of DSH (46%), especially among men, followed by medication overdose (29.8%). Consumption of plant poison and tablet overdose was higher among women. Overall mortality due to DSH was low (1.5%) in our study. CONCLUSION: DSH is under-recognized major public health problem in low-middle income countries like India. Most cases occur among young and productive age group and in equal frequencies among men and women. Timely and the appropriate institution of treatment can decrease the morbidity and mortality due to DSH remarkably. DOI: 10.4103/2249-4863.184627 | NAT | **JAN TO JUN** | **PMCID: PMC**4943154  **PMID:**27453847 |
|  | Jeyaseelan L(1), Yadav B(1), Silambarasan V(1), Vijayaselvi R(2), Jose R(3).  Large for Gestational Age Births Among South Indian Women: Temporal Trend andRisk Factors from 1996 to 2010.  J Obstet Gynaecol India. 2016 Oct;66(Suppl 1):42-50. doi:10.1007/s13224-015-0765-y. Epub 2015 Sep 8.  **Author information:**  (1)Department of Biostatistics, Christian Medical College, Vellore, 632002 India. (2)Obstetrics and Gynaecology Unit IV, Christian Medical College, Vellore, 632002 India. (3)Obstetrics and Gynaecology Unit IV, Christian Medical College, Vellore, 632002 India ; Department of Obstetrics and Gynecology Unit IV, Christian Medical College, Vellore, 632004 India.  BACKGROUND/PURPOSE: Mean birth weight is a good health indicator for any population. In the recent past, there have been many reports in the West indicating that there has been an increase in the proportion of large for gestational age (LGA) babies. The objective is to describe the change in the incidence of LGA babies from 1996 to 2010 in South India and the maternal risk factors.  METHODS: A rotational sampling scheme was used, i.e., the 12 months of the year were divided into 4 quarters and a month was from each quarter was selected rotationally. All deliveries for that month were considered. Only deliveries that occurred between 28 and 42 weeks of pregnancy were considered. The association between risk variables was studied using multivariable logistic regression.  RESULTS: There were 35,718 deliveries that occurred during these 15-year-study period in the gestational age 28-42 weeks were registered through the outpatient clinics. The incidence of LGA was 9.4 % that has mostly remained at the same level. The incidence of LGA in mothers with gestational diabetes was 6.7, 3 and 17.6 % in overweight, obese and gestational l diabetes mothers. Overweight, obesity in pregnant women and cesarean section were significant risk factors.  CONCLUSION: Unlike in Western countries, where the incidence of LGA babies has spiraled upward, has remained nearly at the same level over one and a half decades, in South India. The risk factors for giving birth to LGA babies in South India were similar to other studies.  DOI: 10.1007/s13224-015-0765-y | NAT | **JUL TO DEC** | **PMCID: PMC**5016405  **PMID:**27651576 |
|  | Jiwanmall SA(1), Kattula D(1).  Obsessive-Compulsive Disorder Presenting with Compulsions to Urinate Frequently.  Indian J Psychol Med. 2016 Jul-Aug;38(4):364-5. doi: 10.4103/0253-7176.185953.  **Author information:**  (1)Department of Psychiatry, Christian Medical College, Vellore, Tamil Nadu, India.  Obsessive compulsive disorder (OCD) is a common psychiatric disorder which is easily recognized. However, sometimes patients of OCD present in such an atypical presentation of symptoms and a pathway to care involving multiple specialities. We report a case of a girl who had consulted several physicians and a urologist for frequent micturition, who was treated as a case of OCD after clarifying the compulsive nature of her symptom. There was significant improvement in her condition following 8 weeks of treatment with 200 mg of Sertraline and behavior therapy.  DOI: 10.4103/0253-7176.185953 | NAT | **JUL TO DEC** | **PMCID: PMC**4980909  **PMID:**27570353 |
|  | John D(1), Irodi A(2), Michael JS(3).  Concurrent Infections of Conidiobolus Coronatus with Disseminated TuberculosisPresenting as Bilateral Orbital Cellulitis.  J Clin Diagn Res. 2016 Apr;10(4):ND01-2. doi: 10.7860/JCDR/2016/16790.7535. Epub2016 Apr 1.  **Author information:**  (1)Associate Surgeon, Department of Ophthalmology, Christian Medical College, Vellore, Tamil Nadu, India . (2)Associate Professor, Department of Radiology, Christian Medical College , Vellore, Tamil Nadu, India . (3)Professor, Department of Microbiology, Christian Medical College , Vellore, Tamil Nadu, India .  Zygomycetes species contains two orders of organisms that infect humans, namely Mucorales and Entomophthorales. Entomophthorales cause chronic infection inimmunocompetent patients, invading subcutaneous tissues but are non-angioinvasive. This includes Basidiobolus ranarum, Conidiobolus incongruous and Conidiobolus coronatus. We report a case of disseminated tuberculosis with Conidiobolus coronatus infection presenting as orbital cellulitis in an adolescent. DOI: 10.7860/JCDR/2016/16790.7535 | NAT | **JAN TO JUN** | **PMCID: PMC**4866150  **PMID:**27190852 |
|  | John D(1), Muthusamy K(2), Bandla B(3), Sudhakar SV(4), Thomas M(5).  Ocular Features and Visual Outcome in Children with Moyamoya Disease and MoyamoyaSyndrome: A Case Series.  J Clin Diagn Res. 2016 May;10(5):NR01-4. doi: 10.7860/JCDR/2016/19153.7744. Epub2016 May 1.  **Author information:**  (1)Associate Surgeon, Department of Ophthalmology, Christian Medical College , Vellore, Tamil Nadu, India . (2)Associate Professor, Dept of Neurology, Christian Medical College , Vellore, Tamil Nadu, India . (3)Resident, Department of Ophthalmology, Christian Medical College , Vellore, Tamil Nadu, India . (4)Physician, Department of Radiodagnosis, Christian Medical College , Vellore, Tamil Nadu, India . (5)Professor, Department of Neurology, Christian Medical College , Vellore, Tamil Nadu, India .  Moya Moya Disease (MMD) is characterised by idiopathic vasculopathy affecting the terminal internal carotid arteries resulting in the formation of extensive collaterals at the base of the brain, leptomeninges and parenchymal regions with resultant infarcts and bleeds. Four children presented with clinico-radiological features suggestive of Moyamoya disease/syndrome. This includes global developmental delay, recurrent seizures, transient ischaemic attacks and impaired vision. The first patient had vision of 6/15 in both eyes with bilateral optic disc pallor. Second case also had bilateral optic disc pallor with arteriolar attenuation, but had vision of perception of light only in both eyes. The third child had vision of 6/60 with alternate divergent squint and clinical features suggestive of Neurofibromatosis 1 (NF 1). Fourth patient presented with poor fixation in both eyes with bilateral total cataract. He underwent bilateral cataract surgery with intraocular lens implantation and vision improved to 2/60 with good fixation. We also describe their medical and neurosurgical interventions in this report. DOI: 10.7860/JCDR/2016/19153.7744 | NAT | **JAN TO JUN** | **PMCID: PMC**4948435  **PMID:**27437259 |
|  | John J(1).  Measles: A Canary in the Coal Mines?  Indian J Pediatr. 2016 Mar;83(3):195-6. doi: 10.1007/s12098-015-2004-z. Epub 2016Jan 26.  **Author information:**  (1)Department of Community Health, Christian Medical College, Vellore, Tamil Nadu, 632004, India. jacob@cmcsph.org.  **Comment on**  Indian J Pediatr. 2016 Mar;83(3):200-8.  DOI: 10.1007/s12098-015-2004-z | NAT | **JAN TO JUN** | **PMID:**26809769 |
|  | John M(1), Parsons A(2), Abraham S(3).  The value of an ENT specialist outreach service in a Family Medicine Unit for theurban poor in India.  J Family Med Prim Care. 2016 Jan-Mar;5(1):67-72. doi: 10.4103/2249-4863.184626.  **Author information:**  (1)Department of Otorhinolaryngology, Christian Medical College, Vellore, Tamil Nadu, India. (2)Tufts University School of Medicine, Boston, USA. (3)Department of Family Medicine, Christian Medical College, Vellore, Tamil Nadu, India.  OBJECTIVES: To assess the function of an otolaryngology (ENT) specialist outreach service in a Family Medicine (FM) Unit for the urban poor attached to a Tertiary Teaching Hospital in India. MATERIALS AND METHODS: The study investigated the pattern of ENT diseases in patients who came to the FM Unit and the proportion of these patients who were referred to the ENT specialist clinic at the unit. The study also analyzed the ENT problems that were managed by the ENT specialist at the unit and the conditions, which needed referral to the Tertiary Hospital. Data was collected by chart review. SETTING: Weekly ENT specialist outreach service in an FM Unit for the urban poor in India attached to a Tertiary Teaching Hospital. RESULTS: Among the outpatients who attended the unit in 12 months, 12.89% had ENT-related problems, of which 23.9% were referred to the visiting ENT specialist, 88.30% of these patients were managed in the FM Unit with basic ENT facilities. CONCLUSION: This study demonstrated that majority of the patients with ENT-related problems who presented to an FM Unit could be managed by the FM specialists. Of those patients who required the expertise of a specialist in ENT, the majority could be managed in the FM Unit, with basic ENT examination and treatment facilities. Triage and management by the family physician and the visiting ENT surgeon in the FM Unit is a prudent use of resources and will improve the quality of care people receive for their ENT problems. DOI: 10.4103/2 249-4863.184626 | NAT | **JAN TO JUN** | **PMCID: PMC**4943152  **PMID:**27453846 |
|  | John TJ(1), Das M.  Outbreaks of Hypoglycemic Encephalopathy in Muzaffarpur, India: Are These Causedby Toxins in Litchi Fruit?: The Point.  Indian Pediatr. 2016 May 8;53(5):399.  **Author information:**  (1)JAN TO JUN439 Civil Supplies Godown Lane, Kamalakshipuram, Vellore, TN; and #Food, Drug and Chemical Toxicology Group, CSIR- Indian Institute of Toxicology Research, MG Marg, Lucknow, UP; India. [tjacobjohn@yahoo.co.in](mailto:tjacobjohn@yahoo.co.in). | NAT | **JAN TO JUN** | **PMID:**27254048 |
|  | Jose J(1), Manik G(2), Abdel-Wahab M(3).  Setting up a transcatheter aortic valve implantation program: Indian perspective.  Indian Heart J. 2016 Sep - Oct;68(5):732-736. doi: 10.1016/j.ihj.2015.12.006.Epub 2016 Jan 11.  **Author information:**  (1)Herzzentrum, Segeberger Kliniken GmbH, Academic Teaching Hospital of the Universities of Kiel and Hamburg, Bad Segeberg, Germany; Christian Medical College Hospital, Vellore, India. Electronic address: drjohnjose@gmail.com. (2)Christian Medical College Hospital, Vellore, India. (3)Herzzentrum, Segeberger Kliniken GmbH, Academic Teaching Hospital of the Universities of Kiel and Hamburg, Bad Segeberg, Germany.  Transcatheter aortic valve implantation (TAVI) has revolutionized the management of elderly patients with symptomatic severe aortic stenosis in the western world. It is a valuable alternative to surgical aortic valve replacement in patients, who are inoperable or at high surgical risk due to co-morbidities. The prevalence of aortic stenosis increases sharply with age after the sixth decade and is expected to have a significant impact on the geriatric health care system of India, given the rapid increase in life expectancy in recent years. Although a decade has passed since the first TAVI implantation, it is yet to penetrate most of the developing countries in a major way. This short review focuses on fundamentals of initiating a TAVI program based on the experience of a high volume TAVI center with a successful program in Germany.  Copyright © 2015 Cardiological Society of India. Published by Elsevier B.V. All rights reserved.  DOI: 10.1016/j.ihj.2015.12.006 | NAT | **JUL TO DEC** | **PMCID: PMC**5079126  **PMID:**27773417 |
|  | Jose N(1), Kurian GP(2).  Schimidt Syndrome: An Unusual Cause of Hypercalcaemia.  J Clin Diagn Res. 2016 May;10(5):OD21-2. doi: 10.7860/JCDR/2016/16770.7783. Epub2016 May 1.  **Author information:**  (1)Assistant Professor, Department of General Medicine, Christian Medical College and Hospital , Vellore, Tamil Nadu, India . (2)Assistant Professor, Department of Intensive Care, Christian Medical College and Hospital , Vellore, Tamil Nadu, India .  Autoimmune polyglandular syndrome type 2 also known as Schmidt syndrome. It is a rare disorder involving a combination of Addison's disease with autoimmune thyroid disease with or without type 1 diabetes mellitus. In this case report one such patient with this rare syndrome is described who presented with hyperpigmentation of knuckles, palms and soles with significant weight loss for 2 months. At presentation she also had severe hypercalcaemia. Severe hypercalcaemia is rare and hypercalcaemia at the initial presentation of Addison's disease is also unusual. The mechanism of hypercalcaemia in addisons and management of this patient is discussed. DOI: 10.7860/JCDR/2016/16770.7783 | NAT | **JAN TO JUN** | **PMCID: PMC**4948460  **PMID:**27437284 |
|  | Joseph A(1), Sathyendra S(1).  Hemolytic uremic syndrome associated with snakebite envenomation- A retrospectivecase series.  J Assoc Physicians India. 2016 Jan;64(1):66.  **Author information:**  (1)Christian Medical College,Vellore. | NAT | **JAN TO JUN** | **PMID:**27727880 |
|  | Joseph G(1), Varghese MJ(2), George OK(1).  Transjugular balloon mitral valvotomy in a patient with severe kyphoscoliosis.  Indian Heart J. 2016 Sep;68 Suppl 2:S11-S14. doi: 10.1016/j.ihj.2016.01.015. Epub2016 Jan 29.  **Author information:**  (1)Department of Cardiology, Christian Medical College, Vellore, India. (2)Department of Cardiology, Christian Medical College, Vellore, India. Electronic address: drmithunjv@gmail.com.  Balloon mitral valvotomy (BMV) performed by the conventional transfemoral approach can be difficult or even impossible in the presence of structural impediments such as severe kyphoscoliosis, gross cardiac anatomic distortion and inferior vena caval anomalies. A 25-year-old woman with severe thoracolumbar kyphoscoliosis due to poliomyelitis presented with symptomatic rheumatic mitral valve stenosis. After the failure of transfemoral BMV, the procedure was attempted from the right jugular access, using a modified septal puncture technique. The left atrium was entered from the jugular access and the mitral valve was crossed and dilated successfully using over the wire balloon technique. Transjugular BMV is an effective alternative in patients with kyphoscoliotic spine that preclude transfemoral approach. The detailed technique used for the procedure, its advantages as well as the other percutaneous treatment options are also discussed.  Copyright © 2016. Published by Elsevier B.V.  DOI: 10.1016/j.ihj.2016.01.015 | NAT | **JUL TO DEC** | **PMCID: PMC**5067793  **PMID:**27751258 |
|  | Joseph M(1), Shyamasunder AH(1), Gupta RD(1), Anand V(1), Thomas N(1).  Demographic details, clinical features, and nutritional characteristics of youngadults with Type 1 diabetes mellitus - A South Indian tertiary center experience.  Indian J Endocrinol Metab. 2016 Nov-Dec;20(6):799-804.  **Author information:**  (1)Department of Endocrinology, Diabetes and Metabolism, Christian Medical College and Hospital, Vellore, Tamil Nadu, India.  CONTEXT: Type 1 diabetes mellitus (T1DM) accounts for 5-10% of all diagnosed diabetes and the highest incidence is found in India.  AIMS: The main objectives were to study the demographic, clinical, and nutritional characteristics of young adults with T1DM and its effect glycosylated hemoglobin levels.  SUBJECTS AND METHODS: This cross-sectional study was conducted among young adults with T1DM (18-45 years of age) in a tertiary hospital in South India. Data were obtained from updated medical records. The dietary data were assessed from food diaries and 24 h recall method. Anthropometry was determined.  RESULTS: The analysis revealed that socio-economic variables did not affect the glycosylated hemoglobin levels. The mean glycosylated hemoglobin value was 8.81 ± 2.38%. Nearly, half the patients were malnourished. The overall dietary intake was inadequate. The multivariate regression model, adjusted for confounding factors such as gender, age, and body mass index, revealed that only duration of diabetes and protein intake were significant predictors of glycosylated hemoglobin status (P < 0.005).  CONCLUSION: Integrated care provided at subsidized cost has been pivotal in effective diabetes management. However, there is an urgent need to educate our patients on nutrition therapy. T1DM patients need specialized advice to ensure appropriately balanced nutrition that has a significant impact on their long-term glycemic control.  DOI: 10.4103/2230-8210.192895 | NAT | **JUL TO DEC** | **PMID:**27867883 |
|  | Kaki AR(1), Satyendra S(1).  Scrub typhus with hyperacusis and tinnitus.  J Assoc Physicians India. 2016 Jan;64(1):154.  **Author information:**  (1)Christian Medical College & Hospital, Vellore. | NAT | **JAN TO JUN** | **PMID:**27728719 |
|  | Kalra S(1), Zargar AH(2), Jain SM(3), Sethi B(4), Chowdhury S(5), Singh AK(6),Thomas N(7), Unnikrishnan AG(8), Thakkar PB(9), Malve H(10).  Diabetes insipidus: The other diabetes.  Indian J Endocrinol Metab. 2016 Jan-Feb;20(1):9-21. doi:10.4103/2230-8210.172273.  **Author information:**  (1)Bharti Hospital and BRIDE, Karnal, Haryana, India. (2)Department of Endocrinology, Sher-I-Kashmir Institute of Medical Sciences, Srinagar, Jammu and Kashmir, India. (3)Managing Director, TOTALL Diabetes Hormone Institute, Indore, Madhya Pradesh, India. (4)Consultant Endocrinologist, CARE Hospitals, Hyderabad, Telangana, India. (5)Department of Endocrinology, IPGMER and SSKM Hospital, Kolkata, West Bengal, India. (6)GD Diabetes Institute, Kolkata, West Bengal, India; Sun Valley Diabetes and Endocrine Research Centre, Guwahati, Assam, India. (7)Department of Endocrinology, Diabetes and Metabolism and Vice-Principal (Research), Christian Medical College, Vellore, Tamil Nadu, India. (8)Chellaram Diabetes Institute, Pune, Maharashtra, India. (9)Bombay Hospital and Medical Research Centre, Mumbai, Maharashtra, India. (10)Lead Medical, Asia Pacific region, Ferring Pharmaceuticals Pvt. Ltd., Mumbai, Maharashtra, India.  Diabetes insipidus (DI) is a hereditary or acquired condition which disrupts normal life of persons with the condition; disruption is due to increased thirst and passing of large volumes of urine, even at night. A systematic search of literature for DI was carried out using the PubMed database for the purpose of this review. Central DI due to impaired secretion of arginine vasopressin (AVP) could result from traumatic brain injury, surgery, or tumors whereas nephrogenic DI due to failure of the kidney to respond to AVP is usually inherited. The earliest treatment was posterior pituitary extracts containing vasopressin and oxytocin. The synthetic analog of vasopressin, desmopressin has several benefits over vasopressin. Desmopressin was initially available as intranasal preparation, but now the oral tablet and melt formulations have gained significance, with benefits such as ease of administration and stability at room temperature. Other molecules used for treatment include chlorpropamide, carbamazepine, thiazide diuretics, indapamide, clofibrate, indomethacin, and amiloride. However, desmopressin remains the most widely used drug for the treatment of DI. This review covers the physiology of water balance, causes of DI and various treatment modalities available, with a special focus on desmopressin. DOI: 10.4103/2230-8210.172273 | NAT | **JAN TO JUN** | **PMCID: PMC**4743391  **PMID:**26904464 |
|  | Kalyaniwala K(1), Abhilash K(2), Victor PJ(3).  Cartap Hydrochloride Poisoning.  J Assoc Physicians India. 2016 Aug;64(8):91-92.  **Author information:**  (1)Senior House Surgeon. (2)Associate Professor, Accident and Emergency Department. (3)Assoc. Prof. and Ag. Head, Medical Intensive Care Unit, Christian Medical College (CMC), Vellore, Tamil Nadu.  Cartap hydrochloride is a moderately hazardous nereistoxin insecticide that is increasingly used for deliberate self-harm in India. It can cause neuromuscular weakness resulting in respiratory failure. We report a patient with 4% Cartap hydrochloride poisoning who required mechanical ventilation for 36-hours. He recovered without any neurological deficits. We also review literature on Cartap hydrochloride poisoning.  © Journal of the Association of Physicians of India 2011. | NAT | **JUL TO DEC** | **PMID:**27762121 |
|  | Kang G(1), Thuppal SV, Srinivasan R, Sarkar R, Subashini B, Venugopal S, SindhuK, Anbu D, Parez N, Svensson L, Bose A.  Racecadotril in the Management of Rotavirus and Non-rotavirus Diarrhea inUnder-five Children: Two Randomized, Double-blind, Placebo-controlled Trials.  Indian Pediatr. 2016 Jul 8;53(7):595-600.  **Author information:**  (1)Departments of Gastrointestinal Sciences, Christian Medical College, Vellore, India; JUL TO DECService des Urgences Pediatriques, Hopital d enfants Armand Trousseau, Assistance Publique-Hopitaux de Paris, Paris, France; #Division of Molecular Virology, Department of Clinical and Experimental Medicine, Medical Faculty, Linko ping University, Linko ping, Sweden; and $Community Health, Christian Medical College, Vellore, India. Correspondence to: Dr. Gagandeep Kang, Professor and Head, Division of Gastrointestinal Sciences, Christian Medical College, Vellore, India. gkang@cmcvellore.ac.in.  OBJECTIVE: To study the effect of racecadotril on reduction in the duration of acute rotavirus and non-rotavirus diarrhea.  DESIGN: Two randomized double-blind placebo-controlled trials.  SETTING: Community-based trial in an urban area in Vellore, hospital-based trial at a secondary hospital in Vellore.  PARTICIPANTS: 199 and 130 3-59 month old children in the community- and hospital-based trials, respectively.  METHODS: Racecadotril (1.5 mg/kg/dose, thrice a day for three days) or placebo were given to manage acute diarrhea in both trials.  MAIN OUTCOME MEASURE: Median duration of diarrhea.  RESULTS: Among 124 children completing the hospital trial, the median duration of diarrhea was 25 h in both arms (P=0.5); median total stool weight was 74 g/kg and 53.5 g/kg in racecadotril group and placebo group, respectively (P=0.4); and average fluid intake per day was 3.6 mL/kg/h and 3mL/kg/h in racecadotril and placebo arms, respectively (P=0.3). Among rotavirus-positive children, median duration of diarrhea was 26.9 h and 30.2 h in racecadotril and placebo arms, respectively (P=0.7). In the community, 196 completed the trial, the median duration of diarrhea was 2 days for both arms (P=0.8) and rotavirus positive children had similar outcomes with median diarrheal duration of 3 d in both arms (P=0.4).  CONCLUSIONS: Treatment with racecadotril did not reduce diarrheal duration, stool volume or the requirement for fluid replacement in children with acute gastroenteritis, both with and without rotavirus infection. | NAT | **JUL TO DEC** | **PMID:**27508536 |
|  | Kang G(1).  Rotavirus in India: Forty Years of Research.  Indian Pediatr. 2016 Jul 8;53(7):569-73.  **Author information:**  (1)Division of Gastrointestinal Sciences, Christian Medical College, Vellore, Tamil Nadu, India. gkang@cmcvellore.ac.in.  Rotavirus was first identified as a human pathogen just over 40 years ago, and work on this pathogen in India started shortly thereafter. Subsequent studies have confirmed its pre-eminent role in gastroenteritis in children in India. Standardized surveillance has enabled the documentation of the high burden of disease, and has demonstrated that there is considerable geographic and temporal variation in strain circulation. Internationally licensed vaccines, vaccine candidates based on indigenous strains and out-licensed strains have been tested for safety, immunogenicity and efficacy; three vaccines are now licensed in India and are used in the private sector. Public sector vaccination has begun, and it will be path-breaking for Indian vaccinologists to measure impact of vaccine introduction in terms of safety and effectiveness. So far, India has kept pace with international epidemiologic and vaccine research on rotavirus, and these efforts should continue. | NAT | **JUL TO DEC** | **PMID:**27508532 |
|  | Kharkongor MA(1), Mishra AK(1), Carey R(1), Handsdak S(1).  Ross syndrome - A case series.  J Assoc Physicians India. 2016 Jan;64(1):62.  **Author information:**  (1)Christian Medical College, Vellore. | NAT | **JAN TO JUN** | **PMID:**27727839 |
|  | Kodiatte TA(1), Burad D(2), Rymbai ML(3).  Clinicopathological Features of Intraductal Papillary Mucinous Neoplasms ofPancreas in a Tertiary Care Center: A 14 Year Retrospective Study.  J Clin Diagn Res. 2016 Aug;10(8):EC10-3. doi: 10.7860/JCDR/2016/20226.8296. Epub2016 Aug 1.  **Author information:**  (1)Assistant Professor, Department of General Pathology, Christian Medical College Hospital , Vellore, Tamil Nadu, India . (2)Associate Professor, Department of General Pathology, Christian Medical College Hospital , Vellore, Tamil Nadu, India . (3)Assistant Professor, Department of Hepatopancreaticobiliary (HPB) Surgery, Christian Medical College Hospital , Vellore, Tamil Nadu, India .  INTRODUCTION: Pancreatic surgeries are usually performed for inflammatory conditions and neoplasms. Intraductal Papillary Mucinous Neoplasm (IPMN) account for approximately 5-7% of all pancreatic neoplasms in western literature. To the best of our knowledge, there has been no published literature in Indian subcontinent on IPMN.  AIM: To assess the spectrum of different pancreatic pathologies on pancreatic resection specimens. Also, to review and share the experience on the clinicopathological features of IPMNs in our institute.  MATERIALS AND METHODS: This was a 14 year retrospective study of all cases where pancreatic surgeries were done for pancreatic pathology. The slides and blocks of diagnosed cases of IPMNs were retrieved from the department archives, reviewed and a detailed study on the histopathological features was done.  RESULTS: Among the 377 pancreatic surgical specimens, pancreatitis was the most common diagnosis followed by exocrine neoplasms and endocrine neoplasms. IPMN constituted 3.2 % of all pancreatic neoplasms. Histologically, the most common type was the gastric foveolar type. Pancreatobiliary type was aggressive and associated with an invasive component and had evidence of metastasis on follow up.  CONCLUSION: IPMNs are rare neoplasms of pancreas with a male predominance. They are usually indolent except for the pancreatobiliary type which may have an aggressive course, often associated with an invasive adenocarcinoma component. Diligent follow up is recommended.  DOI: 10.7860/JCDR/2016/20226.8296 | NAT | **JUL TO DEC** | **PMCID: PMC**5028479  **PMID:**27656444 |
|  | Kumar M(1), Thomas N(2).  Appearances are Deceptive - Passing a Nasogastric Tube does Not Always Rule OutOesophageal Atresia.  J Clin Diagn Res. 2016 Apr;10(4):SD01-2. doi: 10.7860/JCDR/2016/18179.7654. Epub2016 Apr 1.  **Author information:**  (1)Associate Professor, Department of Neonatology, Christian Medical College , Vellore, Tamilnadu, India . (2)Professor and Head, Department of Neonatology, Christian Medical College , Vellore, Tamilnadu, India .  Oesophageal atresia/trachea-Oesophageal fistula is commonly diagnosed in the newborn period by inability to pass a nasogastric tube (NGT). We present the instance of a newborn baby where the diagnosis of oesophageal atresia was delayed because of an apparent successful passage of nasogastric tube to the stomach. Failure to reinsert the NGT raised the suspicion of oesophageal atresia which was confirmed by contrast study showing blind upper oesophageal pouch. DOI: 10.7860/JCDR/2016/18179.7654 | NAT | **JAN TO JUN** | **PMCID: PMC**4866210  **PMID:**27190912 |
|  | Kumar S(1), Shubhalaksmi S(2).  Clinical outcome following use of transconjunctival approach in reducingorbitozygomaticomaxillary complex fractures.  Contemp Clin Dent. 2016 Apr-Jun;7(2):163-9. doi: 10.4103/0976-237X.183067.  **Author information:**  (1)Department of Dental and Oral Surgery Unit 1, CMC, Vellore, Tamil Nadu, India. (2)Department of Cranio-Maxillofacial Plastic and Reconstructive Surgery, College of Dental Sciences, Davangere, Karnataka, India.  BACKGROUND: The increasing emphasis on the open reduction and internal fixation of orbito-zygomatico-maxillary complex fractures has led to a more critical appraisal of the various surgical approaches to the orbital and zygomatic skeleton. Transconjunctival approach popularized by Tessier although credited to Bourquet in 1924 offer excellent exposure of the orbito-zygomatico-maxillary complex fracture especially the infra-orbital rim, frontozygomatic suture and the orbital floor. The argument against a transconjunctival access focuses primarily on concern about limited exposure that apparently makes accurate reduction and osteosynthesis of displaced fracture fragments difficult or impossible. Also, due to close association with eye and various ocular complications reported in the literature, most of the surgeons feel skeptical about using this approach. AIM: The aim of this study is to analyze the efficacy of transconjunctival approach in the treatment of orbito-zygomatico-maxillary complex fractures by evaluating the functional and esthetic results and its associated complications. MATERIAL AND METHOD: We report a series of eight patients who have undergone fracture repair of the orbito-zygomatico-maxillary complex via a transconjunctival approach. Postoperative patient evaluation was performed with specific attention paid towards wound healing, functional stability, esthetic appearance and postoperative ocular complications. Postoperatively clinical examination along with radiographic examination was done to evaluate the position of the zygoma and determine the adequacy of fracture reduction. RESULTS: In all the patients excellent surgical exposure has been achieved for reduction and rigid fixation of the fracture fragments. None of the patients had any form of complication related to the approach. There were no postoperative ocular complications. Only one patient had postoperative chemosis which was transient and subsided subsequently. All the patients had excellent esthetic outcome, with symmetry of malar prominence restored and without any evident post-operative complications. CONCLUSION: Superior esthetic results and direct simultaneous access to the orbital rim, orbital floor and lateral orbital wall, support the use of the transconjunctival approach as a frontline approach to access the orbito-zygomatico-maxillary complex. DOI: 10.4103/0976-237X.183067 | NAT | **JAN TO JUN** | **PMCID: PMC**4906857  **PMID:**27307661 |
|  | Kumar S(1).  Systemic Juvenile Idiopathic Arthritis: Diagnosis and Management.  Indian J Pediatr. 2016 Apr;83(4):322-7. doi: 10.1007/s12098-016-2060-z. Epub 2016Feb 26.  **Author information:**  (1)Department of Pediatrics, Christian Medical College, Vellore, Tamil Nadu, 632004, India. [sathishkumar\_cmc@yahoo.com](mailto:sathishkumar_cmc@yahoo.com)  Systemic juvenile idiopathic arthritis (sJIA) is an inflammatory condition characterized by fever, lymphadenopathy, arthritis, rash and serositis. In sJIA, systemic inflammation has been associated with dysregulation of the innate immune system, suggesting that it is an autoinflammatory disorder. IL-1 and IL-6 play a major role in the pathogenesis of sJIA and treatment with IL-1 and IL-6 inhibitors has shown to be highly effective. Recent data suggests that early cytokine blockage might abrogate chronic, destructive, therapy resistant arthritis phase, reflecting a potential "window of opportunity" in the care of children with sJIA. DOI: 10.1007/s12098-016-2060-z | NAT | **JAN TO JUN** | **PMID:**26916892 |
|  | Kumar S(1).  Open versus robotic prostatectomy.  Indian J Urol. 2016 Oct-Dec;32(4):253-254.  **Author information:**  (1)Associate Editor, Indian Journal of Urology, Department of Urology, Christian Medical College, Vellore, Tamil Nadu, India.  DOI: 10.4103/0970-1591.191233 | NAT | **JUL TO DEC** | **PMCID: PMC**5054652  **PMID:**27843204 |
|  | Kumar S(1).  Paraquat tongue.  Indian J Gastroenterol. 2016 Jul;35(4):321. doi: 10.1007/s12664-016-0673-9. Epub2016 Jul 20.  **Author information:**  (1)Department of Pulmonary Medicine, Christian Medical College and Hospital, Vellore, 632 004, India. jupitersap@gmail.com.  DOI: 10.1007/s12664-016-0673-9 | NAT | **JUL TO DEC** | **PMID:**27435617 |
|  | Kurian JJ(1), Jehangir S(1), Varghese IT(1), Thomas RJ(1), Mathai J(1), KarlS(1).  Clinical profile and management options of children with congenital esophagealstenosis: A single center experience.  J Indian Assoc Pediatr Surg. 2016 Jul-Sep;21(3):106-9. doi:10.4103/0971-9261.182581.  **Author information:**  (1)Department of Paediatric Surgery, Christian Medical College, Vellore, Tamil Nadu, India.  AIM: The aim of the study is to review 7 patients with congenital esophageal stenosis treated in our institution from a diagnostic and therapeutic point of view.  MATERIALS AND METHODS: This is a retrospective cohort study of 7 patients treated in Christian Medical College, Vellore from 2008 to 2014. The data were analyzed with regards to age at onset of symptoms, investigative findings, age at definitive treatment, pathology, modalities of treatment, and outcomes.  RESULTS: Symptoms started within the 1(st) year of life in all children with a median age of 4 months. The time of delay in diagnosis ranged from 8 months to 81 months with a mean period of 37 months. About 6 patients had a lower esophageal stenosis and 1 patient had a mid-esophageal stenosis. About 4 of the 7 children underwent endoscopic balloon dilatation from elsewhere, with 2 of the above 4 undergoing a myotomy for a wrongly diagnosed achalasia. The number of dilatations ranged from 2 to 7 with a mean of 4 dilatations. Resection of the stenotic segment with end to end anastomosis was employed in 6 of the 7 patients, and a transverse colon interpositioning was done in 1 patient. An antireflux procedure was performed in one patient. Histopathological examination of the resected specimen revealed tracheobronchial remnant in 3 patients, fibromuscular thickening in 3 patients, and membranous web in 1 patient. Postoperatively, 2 of the 7 patients had asymptomatic gastroesophageal reflux and 1 patient had postoperative stricture requiring one session of endoscopic balloon dilatation. The mean follow-up period was 42 months (range 18-72 months). At the time of the last follow-up, all 7 patients were able to eat solid food, and none of the children were found to have symptoms suggestive of obstruction or gastroesophageal reflux. There was a statistically significant increase in the weight for age after the operation.  CONCLUSION: Congenital esophageal stenosis is rare and often confused with other causes of esophageal obstruction. Although endoscopic balloon dilatation offers an effective temporary relief, we feel that definitive surgery is curative. Long-term results following definitive surgery have been good, especially with respect to symptoms and weight gain.  DOI: 10.4103/0971-9261.182581 | NAT | **JUL TO DEC** | **PMCID: PMC**4895732  **PMID:**27365901 |
|  | Kurien NA(1), John D(2), Chacko G(3), Jacob P(4).  Granulocytic Sarcoma in an Adult with Relapsed Acute Myeloid Leukaemia.  J Clin Diagn Res. 2016 Jan;10(1):ND03-4. doi: 10.7860/JCDR/2016/15215.7093. Epub2016 Jan 1.  **Author information:**  (1)Resident, Department of Ophthalmology, Christian Medical College , Vellore, Tamil Nadu, India . (2)Associate Surgeon, Department of Ophthalmology, Christian Medical College , Vellore, Tamil Nadu, India . (3)Professor, Department of Pathology, Christian Medical College , Vellore, Tamil Nadu, India . (4)Professor, Department of Ophthalmology, Christian Medical College , Vellore, Tamil Nadu, India .  Granulocytic sarcoma is an extramedullary tumour consisting of malignant granulocytic precursor cells that is common among children with acute myeloid leukaemia (AML). We report a case of orbital granulocytic sarcoma in an adult with relapsed undifferentiated AML-M0. It presented as bilateral medial canthal swellings. An incisional biopsy confirmed the diagnosis of granulocytic sarcoma. The swelling resolved with re-induction chemotherapy. DOI: 10.7860/JCDR/2016/15215.7093 | NAT | **JAN TO JUN** | **PMCID: PMC**4740631  **PMID:**26894103 |
|  | M AJ(1), Zachariah A(1).  Changing profile of tetanus in a tertiary care centre in south India : A caseseries of 68 patients.  J Assoc Physicians India. 2016 Jan;64(1):72.  **Author information:**  (1)Christian Medical College, Vellore. | NAT | **JAN TO JUN** | **PMID:**27727943 |
|  | Mahajan A(1), Sen I(1), Hazra D(1), Agarwal S(1).  Management of Epithelioid Sarcoma of the Inguinal Region with Vascular Invasion.  Indian J Surg. 2016 Aug;78(4):315-7. doi: 10.1007/s12262-015-1401-x. Epub 2015Nov 12.  **Author information:**  (1)Department of Vascular Surgery, CMC, Vellore, 632004 India.  Epithelioid sarcoma (ES) is a rare clinically polymorphic tumor that mimics both benign and malignant conditions. It presents with dermal or subcutaneous nodules on the extremities in young adults. We present here a case of epithelioid sarcoma of the inguinal region infiltrating the femoral vessels. Biopsy is diagnostic and good histopathological evaluation is critical in management.  DOI: 10.1007/s12262-015-1401-x | NAT | **JUL TO DEC** | **PMCID: PMC**4987559  **PMID:**27574351 |
|  | Mahajan R(1), Kurien RT(1), Joseph AJ(1), Dutta AK(1), Chowdhury SD(2).  Squamous papilloma of esophagus.  Indian J Gastroenterol. 2016 Mar;35(2):151. doi: 10.1007/s12664-016-0642-3.  **Author information:**  (1)Department of Gastroenterology, Christian Medical College, Vellore, 632 004, India. (2)Department of Gastroenterology, Christian Medical College, Vellore, 632 004, India. [sudipto.d.c@gmail.com](mailto:sudipto.d.c@gmail.com).  DOI: 10.1007/s12664-016-0642-3 | NAT | **JAN TO JUN** | **PMID:**27138928 |
|  | Mahajan R(1), Simon EG(2), Chacko A(1), Reddy DV(1), Kalyan PR(1), Joseph AJ(1),Dutta AK(1), Chowdhury SD(1), Kurien RT(1).  Endoscopic ultrasonography in pediatric patients--Experience from a tertiary carecenter in India.  Indian J Gastroenterol. 2016 Jan;35(1):14-9. doi: 10.1007/s12664-016-0619-2. Epub2016 Mar 5.  **Author information:**  (1)Department of Gastroenterology, Christian Medical College, Vellore, 632 004, Tamil Nadu, India. (2)Department of Gastroenterology, Christian Medical College, Vellore, 632 004, Tamil Nadu, India. [ebbysimon@gmail.com](mailto:ebbysimon@gmail.com).  BACKGROUND AND AIMS: Although endoscopic ultrasound (EUS) is used in the management of various gastrointestinal (GI) diseases in adults, data on its role in children is limited. This study evaluated the indications, safety, and impact of EUS in children. METHODS: Records of children (<18 years age) who underwent EUS between January 2006 and September 2014 were reviewed retrospectively and analyzed. RESULTS: One hundred and twenty-one children (70 males, 51 females) aged 15.2 ± 2.9 years (mean ± SD) underwent 123 diagnostic (including fine needle aspiration cytology (FNAC) in 7) and 2 therapeutic EUS procedures. Conscious sedation was used in 81 procedures (65%) and general anesthesia in 44 (35%). The pancreaticobiliary system was evaluated in 114 (118 procedures), mediastinum in 5, and stomach in 2 patients. EUS diagnosed chronic pancreatitis (21 patients), pancreatic necrosis (1), splenic artery pseudoaneurysm (1), gastric varix (1), pseudocysts (3), insulinomas (2), other pancreatic masses (2), choledocholithiasis (2), choledochal cysts (2), portal biliopathy (1), esophageal leiomyoma (1), gastric neuroendocrine tumor (NET) (1), and GI stromal tumor in stomach (1). EUS-guided FNAC was positive in four of seven patients (two had tuberculosis, one pancreatic solid pseudopapillary tumor, and one gastric NET). Three patients had minor adverse events. EUS had a positive clinical impact in 43 (35.5%) patients. CONCLUSIONS: US is feasible and safe in children. It provides valuable information that helps in their clinical management. DOI: 10.1007/s12664-016-0619-2 | NAT | **JAN TO JUN** | **PMID:**26946134 |
|  | Mahajan RK(1), Rajan SJ(2), Peter JV(3), Suryawanshi MK(4).  Multiple Small Intestine Perforations after Organophosphorous Poisoning: A CaseReport.  J Clin Diagn Res. 2016 Mar;10(3):GD06-7. doi: 10.7860/JCDR/2016/17103.7454. Epub2016 Mar 1.  **Author information:**  (1)Senior Resident, Medical Intensive Care Unit (ICU), Department of Critical Care Medicine, Christian Medical College , Vellore, Tamil Nadu, India . (2)Associate Professor, Department of Medicine Unit 3, Christian Medical College , Vellore, Tamil Nadu, India . (3)Professor, Medical ICU, Department of Critical Care Medicine, Christian Medical College , Vellore, Tamil Nadu, India . (4)Assistant Professor, Department of General Pathology, Christian Medical College , Vellore, India .  Organophosphate poisoning has significant gastrointestinal manifestations including vomiting, diarrhea, cramps and increased salivation. We report an uncommon gastrointestinal complication of multiple small intestinal perforations following organophosphorus poisoning. A 28-year old male presented after ingesting dichlorvos mixed with alcohol. Following the initial cholinergic symptoms, the patient developed severe shock with fever, attributed to aspiration pneumonia. Despite appropriate antibiotics, shock was persistent. Over the next 24-hours, he developed abdominal distension, loose stools and high nasogastric aspirates. Computed tomography showed pneumoperitonium. Exploratory laparotomy revealed six perforations in the jejunum and ileum. The involved portion of the bowel was resected and re-anastomosed, following which only 80-cm of small bowel was left. Postoperatively, shock resolved over 72-hours. However, over the next few days, patient developed features of anastomotic leak. Since only a small portion of the small bowel was preserved, a conservative approach was adopted. He deteriorated further and finally succumbed to the illness. DOI: 10.7860/JCDR/2016/17103.7454 | NAT | **JAN TO JUN** | **PMCID: PMC**4843284  **PMID:**27134898 |
|  | Malik S(1), Giri S(2), Madhu SV(2), Rathi V(3), Banerjee BD(4), Gupta N(5).  Relationship of levels of Vitamin D with flow-mediated dilatation of brachialartery in patients of myocardial infarction and healthy control: A case-controlstudy.  Indian J Endocrinol Metab. 2016 Sep-Oct;20(5):684-689.  **Author information:**  (1)Postgraduate Institute of Medical Education and Research, Chandigarh, India. (2)Department of Medicine, University College of Medical Sciences, New Delhi, India. (3)Department of Radio-diagnostic, University College of Medical Sciences, New Delhi, India. (4)Department of Biochemistry, University College of Medical Sciences, New Delhi, India. (5)Department of Clinical Immunology and Rheumatology, Christian Medical College, Vellore, Tamil Nadu, India.  BACKGROUND: Cardiovascular diseases (CVD) remain the leading cause of death worldwide. Vitamin D deficiency has been linked to increased risk of adverse CV events. Vitamin D deficiency may be responsible for endothelial dysfunction which in turn affects the onset and progression of coronary artery disease and its risk factors, directly or indirectly through various mechanisms.  MATERIALS AND METHODS: It was case-control study. A total of 50 cases of acute myocardial infarction (AMI) (aged 40-60 years), admitted to medicine emergency/CCU, were taken as per ACC/AHA 2007 guidelines. An equal number of age- and sex-matched controls were also taken. Risk factors of AMI, flow-mediated dilatation (FMD), and 25(OH)D levels were studied in all cases and controls. Correlation was also studied between FMD and 25(OH)D.  RESULTS: The mean values of FMD were 18.86 ± 5.39% and 10.35 ± 4.90% in controls and cases, respectively (P < 0.05). The endothelial dilatation after glyceryl trinitrate (GTN) was also studied and was found to be 26.175 ± 4.25% and 18.80 ± 5.72% in controls and cases, respectively (P < 0.05). The mean levels of 25(OH)D in controls and cases were 25.45 ± 12.17 and 14.53 ± 8.28 ng/ml, respectively. In this study, 56% of subjects were Vitamin D deficient, 25% were Vitamin D insufficient, and only 19% had Vitamin D in normal range. A positive correlation coefficient was found between FMD and 25(OH) Vitamin D levels (r = 0.841, P < 0.01). In this study, a positive correlation coefficient was also found between endothelial dilatation after GTN and 25(OH)D levels (r = 0.743, P < 0.01).  CONCLUSION: In this study, it was found that FMD was markedly impaired in patients of AMI when compared to controls. It was also found that majority of the study population was Vitamin D deficient; however, the deficiency was more severe in patients of AMI. We also found out that FMD was positively correlated (r = 0.841) to the deficiency state of Vitamin D in all the study subjects.  DOI: 10.4103/2230-8210.190558 | NAT | **JUL TO DEC** | **PMCID: PMC**5040051  **PMID:**27730081 |
|  | Mani V, George R(1), Vijayakumar K, Nair S.  Type D lymphomatoid papulosis simulating aggressive epidermotropic cytotoxiclymphoma.  Indian J Pathol Microbiol. 2016 Jan-Mar;59(1):81-3. doi:10.4103/0377-4929.174823.  **Author information:**  (1)Department of Dermatology, Christian Medical College, Vellore, Tamil Nadu, India.  Three histological subtypes of lymphomatoid papulosis (LyP), type A (histiocytic), type B (mycosis fungoides like) and type C (anaplastic large cell lymphoma like) are well recognized. Two new histological variants, type D (simulating an aggressive epidermotropic cytotoxic lymphoma) and type E (angioinvasive type) has been described recently. We describe a 27-year-old man presented with a history of asymptomatic erythematous papules on both upper and lower limbs noted since 10 years of age. There were no systemic symptoms. Biopsy revealed an atypical dermal lymphoid infiltrate with epidermotropism, and the immunohistochemical markers showed a diffuse positivity for CD3, CD8, CD56, T1A and granzyme B with the focal positivity of CD30. All other relevant tests were normal. In this case report of a recently described delineated variant of LyP we emphasize the indolent course of this entity although the histology would suggest a more aggressive disease. DOI: 10.4103/0377-4929.174823 | NAT | **JAN TO JUN** | **PMID:**26960644 |
|  | Manik G(1), Jose J(2), Hygriv Rao B(3).  Follicular thyroid carcinoma with tumour thrombus extending into superior venacava and right atrium - A case report.  Indian Heart J. 2016 Sep;68 Suppl 2:S146-S147. doi: 10.1016/j.ihj.2016.05.016.Epub 2016 Jun 11.  **Author information:**  (1)Krishna Institute of Medical Sciences, Hyderabad, India. Electronic address: geetesh.manik@gmail.com. (2)Christian Medical College, Vellore, India. (3)Division of Pacing & Electrophysiology, Krishna Institute of Medical Sciences, Hyderabad, India.  Intra-cardiac extension of tumour thrombus of follicular carcinoma of thyroid is uncommon. We report a case of advanced thyroid carcinoma where tumour thrombus was well profiled with CT scan and transesophageal echo images and extension was noted from SVC into right atrium, with clinical features of superior vena cava syndrome. The clinical significance of the "ring sign" is discussed.  Copyright © 2016 Cardiological Society of India. Published by Elsevier B.V. All rights reserved.  DOI: 10.1016/j.ihj.2016.05.016 | NAT | **JUL TO DEC** | **PMCID: PMC**5067792  **PMID:**27751268 |
|  | Manoharan A(1), Barla GS(2), Peter R(2), Sugumar M(2), Mathai D(3).  Multidrug resistance mediated by co-carriage of extended-spectrumbeta-lactamases, AmpC and New Delhi metallo-beta-lactamase-1 genes amongcarbapenem-resistant Enterobacteriaceae at five Indian medical centres.  Indian J Med Microbiol. 2016 Jul-Sep;34(3):359-61. doi: 10.4103/0255-0857.188350.  **Author information:**  (1)Pushpagiri Research Center, Pushpagiri Institute of Medical Sciences and Research Center, Thiruvalla, Kerala, India. (2)Department of Medicine, Benjamin M Pulimood Laboratories for Infection, Immunity and Inflammation, Christian Medical College, Vellore, Tamil Nadu, India. (3)Department of Medicine, Apollo Institute of Medical Sciences, Education and Research, Hyderabad, Telangana, India.  In this study, we evaluated the coexistence of extended-spectrum beta-lactamases (ESBL), AmpC and New Delhi metallo-beta-lactamase-1 (NDM-1) genes among carbapenem-resistant Enterobacteriaceae (CRE) recovered prospectively from patients at multiple sites. The study included 285 CRE strains from 2782 Gram-negative Bacilli collected from multiple centres during 2007-2010, of which 87 were characterised. Standard and reference laboratory methods were used for resistance determination. Detection of blaNDM-1 , blaAmpC , blaTEM , blaSHV and blaCTX-M was done by polymerase chain reaction. High levels of antimicrobial resistance observed among study isolates. Co-carriage of ESBLs, AmpC and NDM-1 was 26.3%. Nosocomial origin among the co-carriage isolates was 64.3%, with 9.2% associated mortality.  DOI: 10.4103/0255-0857.188350 | NAT | **JUL TO DEC** | **PMID:**27514962 |
|  | Mathew A(1), Srinivasan R, Venugopal S, Kang G.  Direct Medical Costs in Children with Rotavirus and Non-rotavirus DiarrheaAdmitted to a Pediatric Intensive Care Unit and High Dependency Unit in Delhi.  Indian Pediatr. 2016 Jul 8;53(7):639-41.  **Author information:**  (1)Department of Pediatrics, St. Stephens Hospital, Delhi; and Division of Gastrointestinal Sciences, Christian Medical College, Vellore, Tamil Nadu; India. Correspondence to: Dr. Ann Mathew, Department of Pediatrics, St Stephens Hospital, Delhi, India. drannmathew@gmail.com.  OBJECTIVE: To estimate direct medical costs of diarrheal hospitalization of children <5 years admitted in pediatric intensive care unit (PICU) or high dependency unit (HDU).  METHODS: Analysis of medical records and hospital bills of 84 children during two time frames, 2005-08 and 2012-14.  RESULTS: Direct medical costs in PICU increased from INR 17,941 to INR 50,663 per child for rotavirus diarrhea and INR 11,614 to INR 27,106 for non-rotavirus diarrhea, and in HDU from approximately INR 5,800 to INR 10,500 per child for all-cause diarrhea between the two time frames.  CONCLUSIONS: Costs of PICU and HDU care are high and should be included in cost-effectiveness analysis of vaccination. | NAT | **JUL TO DEC** | **PMID:**27508544 |
|  | Mathew MA(1), Venugopal S, Arora R, Kang G.  Leveraging the National Rotavirus Surveillance Network for MonitoringIntussusception.  Indian Pediatr. 2016 Jul 8;53(7):635-8.  **Author information:**  (1)Department of Pediatrics, Malankara Orthodox Syrian Church Medical College Hospital, Kolenchery; JUL TO DECDivision of Gastrointestinal Sciences, Christian Medical College, Vellore; and #Epidemiology and Communicable Diseases Division, Indian Council of Medical Research, New Delhi: India. Correspondence to: Dr Gagandeep Kang, Division of Gastrointestinal Sciences, Christian Medical College, Vellore, Tamil Nadu, India.  OBJECTIVE: To assess feasibility of monitoring intussusception by hospitals participating in the National Rotavirus Surveillance Network.  METHODS: Questionnaire-based survey in 28 hospitals. One hospital with electronic records selected for detailed data analysis.  RESULTS: There was 75% response to the questionnaire. Few network hospitals were suitable for monitoring intussusception in addition to ongoing activities, but there was at least one potential sentinel hospital in each region. The hospital selected for detailed data analysis of cases of intussusception reported an incidence rate of 112 per 100,000 child years in infants. Over 90% of intussusceptions were managed without surgery.  CONCLUSIONS: Selection of sentinel hospitals for intussusception surveillance is feasible and necessary, but will require training, increased awareness and referral. | NAT | **JUL TO DEC** | **PMID:**27508543 |
|  | Mathew SK(1), Kutty KK(2), Ramya I(3), Padmakumar C(2), Pius P(2).  Ondansetron-Induced Life Threatening Hypokalemia.  J Assoc Physicians India. 2016 Feb;64(2):81-82.  **Author information:**  (1)Retired Professor. (2)Assistant Professor of Medicine, Kanyakumari Medical College and Government Hospital, Tamil nadu. (3)Associate Professor of Medicine, CMC Hospital, Vellore.  Ondansetron is widely used in general practice for nausea and vomiting due to any cause. We report a rare side effect, life-threatening hypokalaemia following intravenous Ondansetron injection. It may be judicious to restrict the use of Odansetron to patients with severe vomiting due to chemotherapy or in post-operative state. Life-threatening hypokalemia can occur without any warning and may be difficult to manage in a primary set up. © Journal of the Association of Physicians of India 2011. | NAT | **JAN TO JUN** | **PMID:**27730793 |
|  | Mehendale S(1), Venkatasubramanian S, Girish Kumar CP, Kang G, Gupte MD, Arora R.  Expanded Indian National Rotavirus Surveillance Network in the Context ofRotavirus Vaccine Introduction.  Indian Pediatr. 2016 Jul 8;53(7):575-81.  **Author information:**  (1)National Institute of Epidemiology, Chennai; JUL TO DECChristian Medical College, Vellore; and Indian Council of Medical Research, New Delhi; India. Correspondence to: Dr. Sanjay Mehendale, Director, National Institute of Epidemiology, Indian Council of Medical Research, II Main Road, TNHB, Ayapakkam, Chennai 600077, India. sanjaymehendale@icmr.org.in.  OBJECTIVE: To extend a nation-wide rotavirus surveillance network in India, and to generate geographically representative data on rotaviral disease burden and prevalent strains.  DESIGN: Hospital-based surveillance.  SETTING: A comprehensive multicenter, multi-state hospital based surveillance network was established in a phased manner involving 28 hospital sites across 17 states and two union territories in India.  PATIENTS: Cases of acute diarrhea among children below 5 years of age admitted in the participating hospitals.  RESULTS: During the 28 month study period between September 2012 and December 2014, 11898 children were enrolled and stool samples from 10207 children admitted with acute diarrhea were tested; 39.6% were positive for rotavirus. Highest positivity was seen in Tanda (60.4%) and Bhubaneswar (60.4%) followed by Midnapore (59.5%). Rotavirus infection was seen more among children aged below 2 years with highest (46.7%) positivity in the age group of 12-23 months. Cooler months of September to February accounted for most of the rotavirus associated gastroenteritis, with highest prevalence seen during December to February (56.4%). 64% of rotaviru -infected children had severe to very severe disease. G1 P[8] was the predominant rotavirus strain (62.7%) during the surveillance period.  CONCLUSION: The surveillance data highlights the high rotaviral disease burden in India. The network will continue to be a platform for monitoring the impact of the vaccine. | NAT | **JUL TO DEC** | **PMID:**27508533 |
|  | Mishra AK(1), Chandiraseharan VK(1), Jose N(1), Sudarsanam TD(1).  Chlorantraniliprole: An unusual insecticide poisoning in humans.  Indian J Crit Care Med. 2016 Dec;20(12):742-744. doi: 10.4103/0972-5229.195718.  **Author information:**  (1)Department of General Medicine Unit II, Christian Medical College and Hospital, Vellore, Tamil Nadu, India.  A 26-year-old female presented with deliberate self-harm using chlorantraniliprole, an unknown substance in human toxicology. She developed symptomatic Mobitz Type I atrioventricular block during observation, for which a temporary pacemaker was inserted. She reverted to sinus rhythm after 48 h and was discharged. Although claimed to be nontoxic to humans, chlorantraniliprole, an insecticide, could cause conduction defects by activating ryanodine receptors. To the best of our knowledge, this is the first case of chlorantraniliprole poisoning reported in the medical literature.  DOI: 10.4103/0972-5229.195718 | NAT | **JUL TO DEC** | PMID: 28149035  PMCID: PMC5225778 |
|  | Mitra S(1), Choudhari R, Nori H, Abhilash KP, Jayaseelan V, Abraham AM, CherianAO, Prakash JA, Muliyil J.  Comparative evaluation of validity and cost-benefit analysis of rapid diagnostictest (RDT) kits in diagnosis of dengue infection using composite referencecriteria: A cross-sectional study from south India.  J Vector Borne Dis. 2016 Mar;53(1):30-6.  **Author information:**  (1)Department of Accident and Emergency Medicine, Christian Medical College, Vellore, Tamil Nadu, India.  BACKGROUND & OBJECTIVES: Rapid diagnostic test (RDT) kits are widely used in India for the diagnosis of dengue infection. It is important to evaluate the validity and reliability of these RDTs. The study was aimed to determine the sensitivity, specificity and predictive value of four commercially available RDTs [Panbio Dengue Duo cassette, Standard Diagnostics (SD) Bioline Dengue Duo, J. Mitra Dengue Day-1 test and Reckon Dengue IgG/IgM] against composite reference criteria (CRC), and compare the cost of the tests. METHODS: In this prospective observational study for diagnostic accuracy, we tested stored blood samples from 132 cases of dengue and 149 controls of other infections as classified based on CRC, with all the four RDTs. The CRC was based on the epidemiological considerations, common clinical features and laboratory abnormalities. The non-dengue controls were the cases of proven alternative diagnosis. The diagnostic performances of the tests were compared in terms of sensitivity, specificity and predictive value along with the cost involved per test. RESULTS: The sensitivity of the Panbio and SD RDT kits was found to be 97.7 and 64.3% respectively, and the specificities were 87.8 and 96.6% respectively. The sensitivity of the NS1 antigen capture by SD Duo, Reckon, J. Mitra RDTs was 20.9, 18.6 and 27.1% respectively. The prevalence of dengue specific IgG antibody with Panbio RDT kits was 49.3%. The cost per test for Panbio, SD, Reckon and J. Mitra is US$ 6.90, 4.27, 3.29 and 3.61 respectively. CONCLUSION: It was concluded that in dengue outbreak, Panbio IgM capture RDT alone is reliable and easily available test which can be used in acute phase of dengue infection in any resource limited set up. NS1 capture rates by any of the other three RDTs might not be reliable for the diagnosis of acute dengue infection. | NAT | **JAN TO JUN** | **PMID:**27004576 |
|  | Mitra S(1), Gunasekaran K, Chacko G, Hansdak SG.  Leprous neuromyositis: A rare clinical entity and review of the literature.  Indian J Med Microbiol. 2016 Jan-Mar;34(1):95-7. doi: 10.4103/0255-0857.174120.  **Author information:**  (1)Department of Medicine, Christian Medical College, Vellore, Tamil Nadu, India.  Mycobacterium leprae, the causative agent of leprosy (Hansen's disease), is a slow growing intracellular acid-fast bacillus that affects the skin, peripheral nerves and respiratory tract. In patients with suppressed cell-mediated immunity, the infiltration of the Bacilli can produce disseminated illness such as leprous neuromyositis. We reported a case of 56-year-old gentleman presenting with pyrexia of unknown origin, asymmetric sensory motor axonal polyneuropathy and was on chronic exogenous steroid therapy. On evaluation, his skin, muscle, nerve and bone marrow biopsy showed numerous globi of acid-fast Bacilli suggestive of leprous neuromyositis, a rare form of disseminated Hansen's disease. We reported this case in view of its rarity, atypical manifestation of a relatively rare disease and literature review on poor electrophysiological correlation in the diagnosis of leprous neuromyositis as compared to the histopathological examination. DOI: 10.4103/0255-0857.174120 | NAT | **JAN TO JUN** | **PMID:**26776128 |
|  | Muthusamy K(1), Ekbote AV(2), Thomas MM(1), Aaron S(1), Mathew V(1), Patil AB(1),Sivadasan A(1), Prabhakar AT(1), Yoganathan S(1), Alexander M(1).  Biotin thiamine responsive basal ganglia disease-A potentially treatable inbornerror of metabolism.  Neurol India. 2016 Nov-Dec;64(6):1328-1331. doi: 10.4103/0028-3886.193797.  **Author information:**  (1)Department of Neurological Sciences, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Medical Genetics, Christian Medical College, Vellore, Tamil Nadu, India.  DOI: 10.4103/0028-3886.193797 | NAT | **JUL TO DEC** | **PMID:**27841215 |
|  | Mythri SV(1), Mathew V(2).  Catatonic Syndrome in Anti-NMDA Receptor Encephalitis.  Indian J Psychol Med. 2016 Mar-Apr;38(2):152-4. doi: 10.4103/0253-7176.178812.  **Author information:**  (1)Department of Psychiatry, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Neurological Sciences, Christian Medical College, Vellore, Tamil Nadu, India.  Anti-N-methyl-D-aspartate (NMDA) receptor encephalitis is a newly recognized autoimmune condition. With its typical clinical pattern, consistent association with the presence of auto antibodies and rapid improvement with immunotherapy, this condition is giving insights into the boundaries between psychiatry and other neurosciences, and is opening avenues for future research. In a young lady who presented with catatonia, we considered anti-NMDA receptor encephalitis, after ruling out other aetiologies. After a positive antibody test we treated her with immunotherapy. She showed gradual improvement in her psychotic and catatonic symptoms. Knowledge regarding the nature and function of NMDA receptors and pathophysiology of this particular encephalitis is important for psychiatric practice. The great opportunity for research in this area due to its association with psychotic disorders is evident but an appeal to temper the enthusiasm by considering the historical lessons learnt from Karl Jaspers' critique of General Paresis of Insane, is in place. Catatonic syndrome has to be conceptualized broadly and should be recognised with a separate nosological position. DOI: 10.4103/0253-7176.178812 | NAT | **JAN TO JUN** | **PMCID: PMC**4820557  **PMID:**27114630 |
|  | Naik D(1), Jebasingh KF(2), Ramprasath(3), Roy GB(4), Paul MJ(5).  Video Assisted Thoracoscopic Surgery (VATS) for Excision of an Ectopic AnteriorMediastinal Intra-Thymic Parathyroid Adenoma.  J Clin Diagn Res. 2016 Jun;10(6):PD22-4. doi: 10.7860/JCDR/2016/18108.8023. Epub2016 Jun 1.  **Author information:**  (1)Associate Professor, Department of Endocrinology, Diabetes and Metabolism, Christian Medical College , Vellore, India . (2)Senior Registrar, Department of Endocrinology, Diabetes and Metabolism, Christian Medical College , Vellore, India . (3)Assistant Professor, Department of Thoracic surgery, Christian Medical College , Vellore, India . (4)Professor, Department of Thoracic Surgery, Christian Medical College , Vellore, India . (5)Professor and Head, Department of Endocrine Surgery, Christian Medical College , Vellore, India .  Ectopic anterior mediastinal parathyroid adenoma is a rare cause of Primary Hyperparathyroidism (PHPT). Imaging studies such as Technetium-99m ((99m)Tc) sestamibi parathyroid scan along with a Single Photon Emission Computerized Tomogram (SPECT), and contrast enhanced Computerized Tomogram (CT) of the neck and thorax can precisely localize the ectopic mediastinal parathyroid adenoma. We report a 40-year-old gentleman who presented with persistent pain in the right shoulder following trivial trauma. His biochemical investigations showed an elevated serum calcium of 11.6mg% (Normal: 8.3-10.4 mg%) along with an elevated iPTH of 1443 pg/ml (normal: 8-70 pg/ml) which were suggestive of primary hyperparathyroidism. The localization studies revealed an ectopic cystic parathyroid adenoma in the anterior mediastinum that was not accessible from the neck. He underwent a Video Assisted Thoracoscopic (VAT) excision procedure with normalization of serum calcium and an uncomplicated recovery. The VAT approach is a successful minimally invasive technique for mediastinal parathyroidectomy. DOI: 10.7860/JCDR/2016/18108.8023 | NAT | **JAN TO JUN** | **PMCID: PMC**4963713  **PMID:**27504353 |
|  | Naik D(1), Jebasingh KF(2), Thomas N(3).  Delayed Diagnosis of Graves' Thyrotoxicoisis Presenting as Recurrent AdrenalCrisis in Primary Adrenal Insufficiency.  J Clin Diagn Res. 2016 Apr;10(4):OD20-2. doi: 10.7860/JCDR/2016/16395.7678. Epub2016 Apr 1.  **Author information:**  (1)Associate Professor, Department of Endocrinology, Diabetes and Metabolism, Christian Medical College , Vellore, Tamil Nadu, India . (2)Senior Registrar, Department of Endocrinology, Diabetes and Metabolism, Christian Medical College , Vellore, Tamil Nadu, India . (3)Professor, Department of Endocrinology, Diabetes and Metabolism, Christian Medical College , Vellore, Tamil Nadu, India .  Adrenal crisis is a potential life threatening complication. The common causes of adrenal crisis are infections, surgical stress and abrupt cessation of steroid medications. Endocrine causes like Graves' disease with thyrotoxicosis is one of the less common causes of an adrenal crisis. We report a 42-year-old female who presented with recurrent episodes of adrenal crisis due to delayed diagnosis of thyrotoxicosis. She was initially treated with Carbimazole followed by Radio-iodine ablation and currently she is euthyroid. Her adrenal insufficiency was initially treated with hydrocortisone during the time of adrenal crisis followed by Prednisolone 5 mg once daily in the morning along with fludrocortisone 50 mcg once daily. This case highlights the need for high index of suspicion and less common causes like thyrotoxicosis should be ruled out in patients with adrenal crisis. DOI: 10.7860/JCDR/2016/16395.7678 | NAT | **JAN TO JUN** | **PMCID: PMC**4866171  **PMID:**27190873 |
|  | Nair S(1), Nair BR(1), Vidyasagar A(1), Joseph M(1).  Importance of fibrinogen in dilutional coagulopathy after neurosurgicalprocedures: A descriptive study.  Indian J Anaesth. 2016 Aug;60(8):542-5. doi: 10.4103/0019-5049.187778.  **Author information:**  (1)Department of Neurological Sciences, Christian Medical College, Vellore, Tamil Nadu, India.  BACKGROUND AND AIMS: The routine management of coagulopathy during surgery involves assessing haemoglobin, prothrombin time (PT), activated partial thromboplastin time (aPTT) and platelets. Correction of these parameters involves administration of blood, fresh frozen plasma and platelet concentrates. The study was aimed at identifying the most common coagulation abnormality during neurosurgical procedures and the treatment of dilutional coagulopathy with blood components.  METHODS: During 2 years period, all adult patients undergoing neurosurgical procedures who were transfused two or more units of red cells were prospectively evaluated for the presence of a coagulopathy. PT, aPTT, platelet count and fibrinogen levels were estimated before starting a component therapy.  RESULTS: After assessing PT, aPTT, platelet count and fibrinogen levels following two or more blood transfusions, thirty patients were found to have at least one abnormal parameter that required administration of a blood product. The most common abnormality was a low fibrinogen level, seen in 26 patients; this was the only abnormality in three patients. No patient was found to have an abnormal PT or aPTT without either the fibrinogen concentration or platelet count or both being low.  CONCLUSION: Low fibrinogen concentration was the most common coagulation abnormality found after blood transfusions for neurosurgical procedures.  DOI: 10.4103/0019-5049.187778 | NAT | **JUL TO DEC** | **PMCID: PMC**4989803  **PMID:**27601735 |
|  | Nair V(1), Madan H(1), Sofat S(1), Ganguli P(1), Jacob MJ(1), Datta R(2),Bharadwaj P(2), Sarkar RS(2), Pandit AJ(2), Nityanand S(3), Goel PK(3), GargN(3), Gambhir S(3), George PV(4), Chandy S(4), Mathews V(4), George OK(4), TalwarKK(5), Bahl A(5), Marwah N(5), Bhatacharya A(5), Bhargava B(6), Airan B(6),Mohanty S(6), Patel CD(6), Sharma A(7), Bhatnagar S(6), Mondal A(8), Jose J(4),Srivastava A(4); for MI3 Trial.  Authors' response.  Indian J Med Res. 2016 Jun;143(6):833. doi: 10.4103/0971-5916.192081.  **Author information:**  (1)Army Hospital (Research & Referral), New Delhi, India. (2)Military Hospital, Cardio Thoracic Centre, Pune, India. (3)Sanjay Gandhi Postgraduate Institute of Medical Sciences, Lucknow, India. (4)Christian Medical College, Vellore, India. (5)Postgraduate Institute of Medical Education & Research, Chandhigarh, India. (6)All India Institute of Medical Sciences, New Delhi, India. (7)Department of Biotechnology, Government of India, New Delhi, India. (8)Institute of Nuclear Medicine & Allied Sciences, Delhi, India.  DOI: 10.4103/0971-5916.192081 | NAT | **JAN TO JUN** | **PMID:**27748312 |
|  | Nandi A(1), Barter DM, Prinja S, John TJ.  The Estimated Health and Economic Benefits of Three Decades of Polio EliminationEfforts in India.  Indian Pediatr. 2016 Aug 7;53 Suppl 1:S7-S13.  **Author information:**  (1)Center for Disease Dynamics, Economics and Policy, Washington, USA; JUL TO DECSchool of Public Health, Chandigarh, India; and #Retired Professor of Clinical Virology, Christian Medical College, Vellore, TN, India. Correspondence to: Dr Arindam Nandi, The Center for Disease Dynamics, Economics and Policy, Washington, USA. nandi@cddep.org.  OBJECTIVE: In March 2014, India, the country with historically the highest burden of polio, was declared polio free, with no reported cases since January 2011. We estimate the health and economic benefits of polio elimination in India with the oral polio vaccine (OPV) during 1982-2012.  METHODS: Based on a pre-vaccine incidence rate, we estimate the counterfactual burden of polio in the hypothetical absence of the national polio elimination program in India. We attribute differences in outcomes between the actual (adjusted for under-reporting) and hypothetical counterfactual scenarios in our model to the national polio program. We measure health benefits as averted polio incidence, deaths, and disability adjusted life years (DALYs). We consider two methods to measure economic benefits: the value of statistical life approach, and equating one DALY to the Gross National Income (GNI) per capita.  RESULTS: We estimate that the National Program against Polio averted 3.94 million (95% confidence interval [CI]: 3.89-3.99 million) paralytic polio cases, 393,918 polio deaths (95% CI: 388,897- 398,939), and 1.48 billion DALYs (95% CI: 1.46-1.50 billion). We also estimate that the program contributed to a $1.71 trillion (INR 76.91 trillion) gain (95% CI: $1.69-$1.73 trillion [INR 75.93-77.89 trillion]) in economic productivity between 1982 and 2012 in our base case analysis. Using the GNI and DALY method, the economic gain from the program is estimated to be $1.11 trillion (INR 50.13 trillion) (95% CI: $1.10-$1.13 trillion [INR 49.50-50.76 trillion]) over the same period.  CONCLUSION: India accrued large health and economic benefits from investing in polio elimination efforts. Other programs to control/eliminate more vaccine-preventable diseases are likely to contribute to large health and economic benefits in India. | NAT | **JUL TO DEC** | **PMID:**27771633 |
|  | National Rotavirus Surveillance Network, Kumar CP(1), Venkatasubramanian S, KangG, Arora R, Mehendale S.  Profile and Trends of Rotavirus Gastroenteritis in Under 5 children in India,2012 - 2014, Preliminary Report of the Indian National Rotavirus SurveillanceNetwork.  Indian Pediatr. 2016 Jul 8;53(7):619-22.  **Author information:**  (1)National Institute of Epidemiology, Chennai; JUL TO DECChristian Medical College and Hospital, Vellore; and #Indian Council of Medical Research, New Delhi; India Correspondence to: Dr CP Girish Kumar, National Institute of pidemiology, II Main Road, TNHB, Ayapakkam, Chennai 600 077, India. girishkumar@nie.gov.in.  OBJECTIVE: To estimate the burden of rotavirus-associated gastroenteritis in India.  METHODS: Hospital based surveillance network was established, with clinical evaluation and laboratory testing for rotavirus among children aged below 5 years hospitalized with acute gastroenteritis.  RESULTS: Between September 2012 and December 2014, stool samples from 10207 children were tested and rotavirus was detected in 39.6% of cases. Infections were more commonly seen among younger children (<2 years). Detection rates were higher during cooler months of September February. Among rotavirus infected children, 64.0% had severe or very severe disease. G1P[8] was the predominant rotavirus genotype (62.7%) observed during the surveillance period.  CONCLUSIONS: Surveillance data highlights the high rotavirus disease burden and emphasizes the need for close monitoring to reduce morbidity and mortality associated with rotavirus gastroenteritis in India. | NAT | **JUL TO DEC** | **PMID:**27508539 |
|  | Ninan MM(1), George TK(2), Balaji V(1), Ramya I(2).  Extended spectrum β-lactamase producing Shigella flexneri serotype-2 causingbacteremia in a patient with uncontrolled diabetes mellitus.  Indian J Pathol Microbiol. 2016 Jul-Sep;59(3):420-1. doi:10.4103/0377-4929.188120.  **Author information:**  (1)Department of Microbiology, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Medicine, Christian Medical College, Vellore, Tamil Nadu, India.  We report a case of Shigella flexneri serotype-2 causing bacteremia in an elderly gentleman with uncontrolled diabetes mellitus, who had no other apparent risk factors. Antibiotic susceptibility testing revealed that the organism was a multidrug resistant extended spectrum beta-lactamase producing straian, which was confirmed by molecular characterization. This rare case alerts both the clinician and microbiologist to a previously unaddressed risk factor of Shigella spp. causing bacteremia, as well as emerging resistant strains that are on the rise in immunocompromised patients.  DOI: 10.4103/0377-4929.188120 | NAT | **JUL TO DEC** | **PMID:**27510696 |
|  | Nirmal B(1).  Finger-shaped Red Light Emitting Diode to Ascertain the Depth of Periungual Wart.  J Cutan Aesthet Surg. 2016 Jul-Sep;9(3):201-203.  **Author information:**  (1)Department of Dermatology, Christian Medical College, Vellore, India.  Management of periungual wart is a great challenge, especially when there is subungual extension. The major cause of recurrence of wart is improper clinical assessment of its extent and not directing therapy against the entire wart. This difficulty of ascertaining its extent could be overcome with this finger-shaped red light emitting diode device. Red light in the device penetrates the thick palmar skin and dark constitutive skin colour due to its longer wavelength.  DOI: 10.4103/0974-2077.191655 | NAT | **JUL TO DEC** | **PMCID: PMC**5064687  **PMID:**27761093 |
|  | Nirmal B(1).  Use of Dermatoscope to Monitor the Repigmentation of Various Vitiligo Surgical Procedures.  J Cutan Aesthet Surg. 2016 Oct-Dec;9(4):286-287. doi: 10.4103/0974-2077.197090.  **Author information:**  (1)Department of Dermatology, Venereology and Leprosy, Christian Medical College, Vellore, Tamil Nadu, India. DOI: 10.4103/0974-2077.197090 | NAT | **JUL TO DEC** | PMID: 28163468 |
|  | Oommen AM(1), Abraham VJ(1), George K(1), Jose VJ(2).  Prevalence of risk factors for non-communicable diseases in rural & urban Tamil Nadu.  Indian J Med Res. 2016 Sep;144(3):460-471. doi: 10.4103/0971-5916.198668.  **Author information:**  (1)Department of Community Health, Christian Medical College, Vellore, India.  (2)Department of Cardiology, Christian Medical College, Vellore, India.  BACKGROUND & OBJECTIVES: Surveillance of risk factors is important to plan suitable control measures for non-communicable diseases (NCDs). The objective of this study was to assess the behavioural, physical and biochemical risk factors for NCDs in Vellore Corporation and Kaniyambadi, a rural block in Vellore district, Tamil Nadu, India. METHODS: This cross-sectional study was carried out among 6196 adults aged 30-64 yr, with 3799 participants from rural and 2397 from urban areas. The World Health Organization-STEPS method was used to record behavioural risk factors, anthropometry, blood pressure, fasting blood glucose and lipid profile. Multiple logistic regression was used to assess associations between risk factors. RESULTS: The proportion of tobacco users (current smoking or daily use of smokeless tobacco) was 23 per cent in the rural sample and 18 per cent in the urban, with rates of smoking being similar. Ever consumption of alcohol was 62 per cent among rural men and 42 per cent among urban men. Low physical activity was seen among 63 per cent of the urban and 43 per cent of the rural sample. Consumption of fruits and vegetables was equally poor in both. In the urban sample, 54 per cent were overweight, 29 per cent had hypertension and 24 per cent diabetes as compared to 31, 17 and 11 per cent, respectively, in the rural sample. Physical inactivity was associated with hypertension, body mass index (BMI) ≥25 kg/m[2], central obesity and dyslipidaemia after adjusting for other factors. Increasing age, male sex, BMI ≥25 kg/m[2] and central obesity were independently associated with both hypertension and diabetes. INTERPRETATION & CONCLUSIONS: Diabetes, hypertension, dyslipidaemia, physical inactivity and overweight were higher in the urban area as compared to the rural area which had higher rates of smokeless tobacco use and alcohol consumption. Smoking and inadequate consumption of fruits and vegetables were equally prevalent in both the urban and rural samples. There is an urgent need to address behavioural risk factors such as smoking, alcohol consumption, physical inactivity and inadequate intake of fruits and vegetables through primary prevention.  DOI: 10.4103/0971-5916.198668 | NAT | **JUL TO DEC** | PMID: 28139545 |
|  | Oommen AM(1), Abraham VJ(2), George K(2), Jose VJ(2).  Prevalence of coronary heart disease in rural and urban Vellore: A repeatcross-sectional survey.  Indian Heart J. 2016 Jul-Aug;68(4):473-9. doi: 10.1016/j.ihj.2015.11.015. Epub2016 Jan 11.  **Author information:**  (1)Associate Professor, Department of Community Health, Christian Medical College, Vellore, Tamil Nadu 632002, India. Electronic address: anuoommen@cmcvellore.ac.in. (2)Department of Community Health, Christian Medical College, Vellore, Tamil Nadu 632002, India.  BACKGROUND: With the increase of cardiovascular risk factors in India, the prevalence of coronary heart disease (CHD) is also expected to rise. A cross-sectional study in 2010-2012 assessed the prevalence and risk factors for CHD in urban and rural Vellore, Tamil Nadu. The secondary objectives were to compare the current prevalence with the prevalence of CHD in the same areas in 1991-1994.  METHODS: A cross-sectional survey was carried out among adults aged 30-64 years to determine the prevalence of CHD (previously diagnosed disease, symptoms detected using Rose angina questionnaire, or ischemic changes on electrocardiography). The study used the WHO STEPS method in addition to the Rose angina questionnaire and resting electrocardiography and was conducted in nine clusters of a rural block in Vellore district and 48 wards of Vellore town. The results were compared with a similar study in the same area in 1991-1994.  RESULTS: The prevalence of CHD was 3.4% (95% CI: 1.6-5.2%) among rural men, 7.4% (95% CI: 4.7-10.1%) among rural women, 7.3% (95% CI: 5.7-8.9%) among urban men, and 13.4% (95% CI: 11.2-15.6%) among urban women in 2010-2012. The age-adjusted prevalence in rural women tripled and in urban women doubled, with only a slight increase among males, between 1991-1994 and 2010-2012.  CONCLUSIONS: The large increase in prevalence of CHD, among both pre- and post-menopausal females, suggests the need for further confirmatory studies and interventions for prevention in both rural and urban areas.  Copyright © 2015 Cardiological Society of India. Published by Elsevier B.V. All rights reserved.  DOI: 10.1016/j.ihj.2015.11.015 | NAT | **JUL TO DEC** | **PMCID: PMC**4990735  **PMID:**27543468 |
|  | Oommen AM(1), Abraham VJ(2), George K(2), Jose VJ(3).  Rising trend of cardiovascular risk factors between 1991-1994 and 2010-2012: Arepeat cross sectional survey in urban and rural Vellore.  Indian Heart J. 2016 May-Jun;68(3):263-9. doi: 10.1016/j.ihj.2015.09.014. Epub2016 Jan 13.  **Author information:**  (1)Department of Community Health, CMC, Vellore, India. Electronic address: anuoommen@cmcvellore.ac.in. (2)Department of Community Health, CMC, Vellore, India. (3)Department of Cardiology, CMC, Vellore, India.  BACKGROUND: Repeat cross sectional surveys document the trend of prevalence rates for non-communicable diseases and their risk factors. In this study, we compare the prevalence rates for risk factors for cardiovascular disease in urban and rural Vellore between 1991-1994 and 2010-2012. METHODS: Cross sectional survey was carried out in 1991-1994 in a rural block in Vellore district and in Vellore town, to study the prevalence of cardiovascular risk factors among adults aged 30-60 years. A repeat survey was done in 2010-2012 using the WHO STEPS method. In both surveys, socio-demographic and behavioral history, physical measurements, biochemical measurements, and medical history were obtained. Age adjusted rates were used to compare the rates in the two surveys. RESULTS: In the rural areas, there was a three times increase in diabetes and body mass index (BMI) ≥25kg/m(2) (overweight/obese) with a doubling of the prevalence of hypertension. In urban areas there was a tripling of diabetes, doubling of proportion with BMI≥25kg/m(2) and 50% increase in prevalence of hypertension. While the proportion of male current smokers reduced by 50% in both rural and urban Vellore, lifetime abstainers to alcohol decreased in the rural area from 46.8% to 37.5% (p<0.001). CONCLUSIONS: There has been an alarming rise in diabetes, hypertension, and overweight/obese with an even greater increase in rural areas. Alcohol use is increasing while smoking is on the decline. Primary prevention programs are required urgently to stem the rising incidence of non-communicable diseases in India. Copyright © 2015 Cardiological Society of India. Published by Elsevier B.V. All rights reserved. DOI: 10.1016/j.ihj.2015.09.014 | NAT | **JAN TO JUN** | **PMCID: PMC**4911447  **PMID:**27316476 |
|  | Paul A(1), Babji S, Sarkar R, Lazarus RP, Kang G.  Rotavirus specific Salivary and Fecal IgA in Indian Children and Adults.  Indian Pediatr. 2016 Jul 8;53(7):601-6.  **Author information:**  (1)Wellcome Trust Research Laboratory, Division of Gastrointestinal Sciences, Christian Medical College, Vellore TN, India. Correspondence to: Dr Gagandeep Kang, The Wellcome Trust Research Laboratory, Division of Gastrointestinal Sciences, Christian Medical College, Vellore Tamil Nadu 632 004, India. gkang@cmcvellore.ac.in.  OBJECTIVE: To compare serum, salivary and fecal IgA responses in infants and adults following rotavirus vaccination.  STUDY DESIGN: Laboratory testing of samples from clinical trials.  SETTING: Medical College Hospital.  PARTICIPANTS: 13 healthy adult volunteers not given vaccine, 20 healthy adult volunteers given one dose of bovine rotavirus tetravalent vaccine (Shantha Biotechnics), and 88 infants given 3 or 5 doses of Rotarix.  OUTCOME MEASURES: Serum, salivary and fecal IgA at one or more time points.  METHODS: IgA antibodies were estimated in serum, saliva and fecal samples by enzyme-linked immunosorbent assay, and normalized to total IgA in saliva.  RESULTS: In naturally infected adult volunteers, comparing serum and salivary IgA showed significant positive correlation (r=0.759; P=0.003). Of 20 vaccinated adults, complete samples showing change were available for 10; among them there was a significant positive correlation (P<0.05) between pre-vaccination serum and pre-vaccination salivary IgA but not between post-vaccination serum and post-vaccination salivary IgA. Of 88 infants given 3 or 5 doses of vaccine, 13 had more than 4-fold IgA response in serum, saliva and fecal samples, 6 had a 2-4 fold increases in all specimens. There was weak correlation between seroconversion rates measured by serum and salivary antibody responses. Salivary and stool assays were able to detect seroconversion in a few children in whom there was no detectable response in serum.  CONCLUSIONS: Evaluation of multiple samples is useful for intensive experimental study designs and may help improve our understanding of the induction and dynamics of immune responses to rotavirus vaccination. | NAT | **JUL TO DEC** | **PMID:**27508537 |
|  | Paul A(1), Peringattuthodiyil Y(1), Christopher DJ(1), Thangakunam B(1).  Young onset hemoptysis: A rare cause of pulmonary arterial aneurysm.  Lung India. 2016 May-Jun;33(3):345-7. doi: 10.4103/0970-2113.180952.  **Author information:**  (1)Department of Pulmonary Medicine, Christian Medical College, Vellore, Tamil Nadu, India E-mail: [akhil\_pauli@yahoo.com](mailto:akhil_pauli@yahoo.com).  DOI: 10.4103/0970-2113.180952 | NAT | **JAN TO JUN** | **PMCID: PMC**4857578  **PMID:**27186006 |
|  | Paul NS(1), Asirvatham M(1).  Geriatric health policy in India: The need for scaling-up implementation.  J Family Med Prim Care. 2016 Apr-Jun;5(2):242-247.  **Author information:**  (1)Department of Rural Unit for Health and Social Affairs, Christian Medical College, Vellore, Tamil Nadu, India.  In an anticipation of the rising geriatric population in India, the Central government constituted the National Policy for Older Persons in 1999 to promote the health and welfare of senior citizens in India. A major strategy of this policy is to encourage families to take care of their older family members. The policy also encourages voluntary organizations to supplement the care provided by the family and provide care and protection to vulnerable elderly people. The implementation of this policy, particularly in the rural areas, has been negligible and calls for a scaling-up of programs to address the physical, psychological, and social needs of the poor. Due to breakdown of the joint family system and the migration of the younger generation to the towns and cities, the elderly parents in the villages are left to fend for themselves. Too old to work and with little or no source of income, the elders are struggling even to satisfy their basic needs. This article primarily focuses on the various facets of elderly care in India. As a fledgling nation in elderly care, we should take cues from other nations who have pioneered in this field and should constantly evolve to identify and face the various challenges that come up, especially from rural India. The Rural Unit for Health and Social Affairs Department of a well-known Medical College in South India has developed a "senior recreation day care" model which proves to be a useful replicable model to improve the quality of life and nutritional status of the elderly in the lower rungs of society. More than a decade since its inception, it is now the right time to assess the implementation of our geriatric health policy and scale-up programs so that the elderly in our country, irrespective of urban and rural, will have a dignified and good quality life. DOI: 10.4103/2249-4863.192333 | NAT | **JAN TO JUN** | **PMCID: PMC**5084541  **PMID:**27843821 |
|  | Paul RR(1), Varghese AM(1), Mathew J(1), Chandrasekharan R(1), Amalanathan S(2),Asif SK(1), Kurien M(1).  Difficult Laryngeal Exposure in Microlaryngoscopy: Can it be PredictedPreoperatively?  Indian J Otolaryngol Head Neck Surg. 2016 Mar;68(1):65-70. doi:10.1007/s12070-015-0913-9. Epub 2015 Sep 21.  **Author information:**  (1)Department of ENT, Christian Medical College, Vellore, 632004 Tamil Nadu India. (2)Department of ENT, Indira Gandhi Medical College and Research Institute, Pondicherry, India.  The aim of the present study was to identify preoperative clinical predictors for difficult laryngeal exposure (DLE) and to define a simple grading system for laryngeal exposure. This is a prospective descriptive study carried out in a tertiary teaching hospital in South India. Patients above 18 years undergoing microlaryngoscopy had presurgical evaluation of 11 physical parameters. Grading of Modified Cormack-Lehane Score (MCLS) and rigid laryngoscopy were done during procedure. On logistic regression analysis, with a 95 % confidence interval (CI) MCLS was found to be a statistically significant predictor (odds ratio 12). With 90 % CI, neck circumference, atlanto-occipital extension and MCLS were significant (odds ratio of 4, 4, 12 respectively). Neck circumference of more than 34.25 cm and limited atlanto-occipital extension of less than 19.50, predicts difficult laryngeal exposure. A simple grading system for laryngeal exposure during microlaryngoscopy is being proposed. MCLS grade more than 2a done intra operatively correlates well with difficult intubation. DOI: 10.1007/s12070-015-0913-9 | NAT | **JAN TO JUN** | **PMCID: PMC**4809832  **PMID:**27066414 |
|  | Paul SS(1), Ramamurthy PH(1), Kumar R(1), Ashirvatham M(1), John KR(2), IsaacR(1).  Seniors' Recreation Centers in Rural India: Need of the Hour.  Indian J Community Med. 2016 Jul-Sep;41(3):219-22. doi: 10.4103/0970-0218.183585.  **Author information:**  (1)Department of Rural Unit for Health and Social Affairs (RUHSA), Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Community Medicine, SRM Medical College Hospital and Research Centre, SRM University, Kancheepuram, Tamil Nadu, India.  AIM: To empower and bring the underprivileged senior citizens in the rural areas to the mainstream of life through setting up of model "senior citizens' recreation centers" that can be replicated in the other parts of the country.  MATERIALS AND METHODS: Six senior citizens' recreation centers are run in six villages under a community health program of a leading Medical College in South India, which were started by looking into their perceived needs and in a location where organized self-help women groups (SHGs) showed willingness to take the role of caretakers. Together there are 140 members in 6 centers and the most deserving members were identified using a participatory rural appraisal (PRA) method. These centers are open for 5 days a week and the main attraction of the center has been provision of one good, wholesome, noon-meal a day, apart from several recreational activities. The members were also assessed for chronic energy deficiency (CED) and quality of life at the beginning of enrolment using body mass index (BMI) and WHO-BREF scale.  RESULTS: The attendance to these centers was nearly 90% of the enrolled beneficiaries. A statistically significant improvement was noticed in quality of life in the physical, psychological, social, and environmental domain (P < 0.05). There was also a significant increase in the average BMI after 1 year of the intervention (P < 0.05).  CONCLUSION: Care of underprivileged senior citizens is a growing need in the rural areas and the "Recreation centers" proved to be a beneficial model that can be easily replicated.  DOI: 10.4103/0970-0218.183585 | NAT | **JUL TO DEC** | **PMCID: PMC**4919936  **PMID:**27385876 |
|  | Peter CD(1), Jennifer A(2).  Multiple Giant Cutaneous Horns in a Renal Transplant Recipient.  Indian J Dermatol. 2016 Jan-Feb;61(1):124. doi: 10.4103/0019-5154.174156.  **Author information:**  (1)Department of Dermatology, Venereology and Leprosy, Christian Medical College, Vellore, Tamil Nadu, India. E-mail: dincypeter@gmail.com. (2)Department of Pathology, Christian Medical College, Vellore, Tamil Nadu, India.  DOI: 10.4103/0019-5154.174156 | NAT | **JAN TO JUN** | **PMCID: PMC**4763662  **PMID:**26955148 |
|  | Petnikota H(1), Madhuri V(1), Gangadharan S(1), Agarwal I(2), Antonisamy B(3).  Retrospective cohort study comparing the efficacy of prednisolone and deflazacortin children with muscular dystrophy: A 6 years' experience in a South Indianteaching hospital.  Indian J Orthop. 2016 Sep;50(5):551-557.  **Author information:**  (1)Department of Paediatric Orthopaedics, CMC, Vellore, Tamil Nadu, India. (2)Department of Child Health, CMC, Vellore, Tamil Nadu, India. (3)Department of Biostatistics, CMC, Vellore, Tamil Nadu, India.  BACKGROUND: Muscular dystrophies are inherited myogenic disorders characterized by progressive muscle wasting and weakness of variable distribution and severity. They are a heterogeneous group characterized by variable degree of skeletal and cardiac muscle involvement. The most common and the most severe form of muscular dystrophy is DMD. Currently, there is no curative treatment for muscular dystrophies. Several drugs have been studied to retard the progression of the muscle weakness. There is much controversy about steroid usage in muscular dystrophy with respect to regimen, adverse effects, and whether long term benefits outweigh side effects. This study is to assess steroid efficacy in children with muscular dystrophy.  MATERIALS AND METHODS: All children with diagnosed muscular dystrophy by muscle biopsy, immunohistochemistry and/or genetic test were enrolled in the study. They were started on either prednisolone (0.75 mg/kg/day) or deflazacort 0.9 mg/kg/day based on affordability. All were followed up every 6 months with clinical assessment, quality of life questionnaire and clinical and laboratory assessment of side effects. Outcome measures of children on deflazacort and prednisolone at 1 year followup were summarized as numbers and percentages and were compared using Fisher's exact test.  RESULTS: Twenty two children with muscular dystrophy were included (prednisolone group: 10 and deflazacort group: 12). The mean age was 7.7 years at an average followup of 26.4 months. Twenty children were diagnosed to have Duchenne's; one had Becker's muscular dystrophy while one had sarcoglycanopathy by Type 2C. All children from prednisolone group maintained their ambulatory status at 2 and 4 years followups while three on deflazacort lost their ability to walk at an average age of 11.3 years. All activities of daily living were found to be better in prednisolone group. Muscle function and time taken to walk improved in prednisolone group. Weight gain in children on prednisolone was three times more.  CONCLUSIONS: Prednisolone is more beneficial than deflazacort at doses of 0.75 mg/kg/day and 0.9 mg/kg/day, respectively, however it is associated with adverse effects.  DOI: 10.4103/0019-5413.189609 | NAT | **JUL TO DEC** | **PMCID: PMC**5017179  **PMID:**27746500 |
|  | Prabha R(1), Mathew BS(1), Jeyaseelan V(2), Kumar TS(3), Agarwal I(3), FlemingDH(1).  Development and validation of limited sampling strategy equation formycophenolate mofetil in children with systemic lupus erythematosus.  Indian J Nephrol. 2016 Nov-Dec;26(6):408-412.  **Author information:**  (1)Department of Pharmacology, Clinical Pharmacology Unit, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Biostatistics, Christian Medical College, Vellore, Tamil Nadu, India. (3)Department of Child Health, Christian Medical College, Vellore, Tamil Nadu, India.  The aim of this study was to establish a limited sample strategy (LSS) to predict the mycophenolic acid (MPA) area under the curve (AUC)(0-12) in children with systemic lupus erythematosus (SLE). Three months after initiation of mycophenolate mofetil (MMF) 26 children with SLE presented for therapeutic drug monitoring of MPA. On the day of the test, 10 specimens were collected, analyzed, and MPA AUC(0-12) was calculated. Using step-wise regression analysis, LSS equations were developed. Using bootstrap validation, the predictive performance was calculated. The measured mean (standard deviation) for the trough concentration and AUC(0-12) were 2.55 (1.57) μg/ml and 62.6 (21.67) mg.h/L, respectively. The range of trough concentrations and AUC(0-12) were 0.7-5.54 μg/ml and 22.1-104.8 mg.h/L, respectively. The interindividual variability (%CV) for dose normalized AUC(0-12) and dose normalized Ctrough was 46.5% and 61.1%, respectively. The correlation between the concentrations at the different time points and MPA AUC(0-12) ranged from 0.05 (1.5 h) to 0.56 (4 h). Two LSS equations that included 4 or 5 time points up to 3 h were developed and validated. The 4 point LSS had a correlation (R(2)) of 0.88 and the 5 point LSS an R(2) of 0.87. With respect to the 4 point and 5 point MPA LSS AUC(0-12), the bias was 1.92% and 1.96%, respectively, and the imprecision was 11.24% and 11.28%, respectively. A 4 point LSS which concludes within 3 h after the administration of the MMF dose was developed and validated, to determine the MPA AUC(0-12) in children with SLE.  DOI: 10.4103/0971-4065.174242 | NAT | **JUL TO DEC** | **PMCID: PMC**5131378  **PMID:**27942171 |
|  | Pragasam AK(1), Sahni RD(2), Anandan S(2), Sharma A(3), Gopi R(1), HadibashaN(1), Gunasekaran P(1), Veeraraghavan B(4).  A Pilot Study on Carbapenemase Detection: Do We See the Same Level of Agreementas with the CLSI Observations.  J Clin Diagn Res. 2016 Jul;10(7):DC09-13. doi: 10.7860/JCDR/2016/16417.8152. Epub2016 Jul 1.  **Author information:**  (1)Research Associate, Department of Clinical Microbiology, Christian Medical College , Vellore, India . (2)Professor, Department of Clinical Microbiology, Christian Medical College , Vellore, India . (3)Registrar, Department of Clinical Microbiology, Christian Medical College , Vellore, India . (4)Professor & Head, Department of Clinical Microbiology, Christian Medical College , Vellore, India .  INTRODUCTION: Rapid identification of carbapenemase producing organisms is of great importance for timely detection, treatment and implementation of control measures to prevent the spread. The Modified Hodge Test (MHT) and Carba NP test is recommended by CLSI for the detection of carbapenemases in Enterobacteriaceae. However, MHT may give false positive results or fail to detect metallo β-lactamases (MBLs). In the US, MHT is the most widely used test for detection of carbapenemases and has been found to have a sensitivity and specificity of >90% for bla KPC producers. However, in India, the prevalence of bla NDM is higher than bla KPC producers.  AIM: To evaluate the usefulness of CarbaNP in an Indian setting.  MATERIALS AND METHODS: A total of 260 isolates of carbapenem resistant E.coli (n=57), Klebsiella spp. (n=85), Pseudomonas aeruginosa (n=60), and Acinetobacter baumannii (58) isolated from clinical specimens between 2012-2014 at the Christian Medical College, Vellore were included in the study. All the carbapenem resistant isolates were subjected to CarbaNP, MHT and multiplex PCR for detection of carbapenemase genes.  RESULTS: CarbaNP was found to be positive in 88% (n=50/57), 81% (n=69/51), 38% (n=23/60) and 81% (n=47/58) for E.coli, Klebsiella spp., P. aeruginosa, and A. baumannii respectively. While in MHT it showed, 89% (n=51/57) and 81 % (n=69/85) for E.coli and Klebsiella spp. respectively. In P.aeruginosa, synergy testing of imipenem plus cloxacillin showed that, 65% of CarbaNP negatives were ampC producers. Overall, the sensitivity and specificity of CarbaNP was found to be 94% and 100 for bla NDM; 77% and 100 % for bla OXA-48 like producers and 81% and 100% for CarbAcinetoNP respectively.  CONCLUSION: This observation was more than what was reported in CLSI guidelines. Therefore, it is advisable to evaluate an assay for better laboratory diagnosis at respective regions.  DOI: 10.7860/JCDR/2016/16417.8152 | NAT | **JUL TO DEC** | **PMCID: PMC**5020186  **PMID:**27630840 |
|  | Pragasam AK(1), Vijayakumar S(1), Bakthavatchalam YD(1), Kapil A(2), Das BK(2),Ray P(3), Gautam V(3), Sistla S(4), Parija SC(4), Walia K(5), Ohri VC(5), AnandanS(1), Veeraraghavan B(1).  Molecular characterisation of antimicrobial resistance in Pseudomonas aeruginosaand Acinetobacter baumannii during 2014 and 2015 collected across India.  Indian J Med Microbiol. 2016 Oct-Dec;34(4):433-441. doi:10.4103/0255-0857.195376.  **Author information:**  (1)Department of Clinical Microbiology, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Microbiology, All Institute of Medical Sciences, New Delhi, India. (3)Department of Medical Microbiology, Post Graduate Institute of Medical Education and Research, Chandigarh, India. (4)Department of Microbiology, Jawaharlal Institute of Postgraduate Medical Education and Research, Puducherry, India. (5)Division of Epidemiology and Communicable Diseases, n Council for Medical Research, New Delhi, India.  BACKGROUND: Surveillance of antimicrobial resistance (AMR) is of great importance. Pseudomonas aeruginosa and Acinetobacter baumannii are important pathogens and emergence of resistance in these have increased the morbidity and mortality rates. This surveillance study was initiated by the Government of India - Indian Council of Medical Research. The aim of this study is to determine the antimicrobial susceptibility profile and to characterise the enzyme mediated antimicrobial resistance such as extended spectrum beta-lactamases (ESBLs) and carbapenemases among multidrug-resistant (MDR) P. aeruginosa and A. baumannii.  MATERIALS AND METHODS: A multi-centric study was conducted from January 2014 to December 2015 with a total number of 240 MDR P. aeruginosa and 312 MDR A. baumannii isolated from blood, cerebrospinal fluid, respiratory, pus, urine and intra-abdominal infections. Kirby-Bauer disc diffusion was done to determine the antimicrobial susceptibility profile. Further, MDR isolates were characterised by multiplex polymerase chain reaction to determine the resistance genes for ESBLs and carbapenemases.  RESULTS: Among the ESBLs, blaVEB (23%), blaTEM (5%) and blaSHV (0.4%) in P. aeruginosa and blaPER (54%), blaTEM (16%) and blaSHV (1%) in A. baumannii were the most prevalent. Likewise, blaVIM (37%), blaNDM (14%), blaGES (8%) and blaIMP (2%) in P. aeruginosa and blaOXA-23like (98%), blaOXA-58like (2%), blaNDM (22%) and blaVIM (3%) in A. baumannii were found to be the most prevalent carbapenemases. blaOXA-51like gene, intrinsic to A. baumannii was present in all the isolates tested.  CONCLUSION: The data shown highlight the wide difference in the molecular mechanisms of AMR profile between P. aeruginosa and A. baumannii. In P. aeruginosa, plasmid-mediated mechanisms are much lesser than the chromosomal mediated mechanisms. In A. baumannii, class D oxacillinases are more common than other mechanisms. Continuous surveillance to monitor the trends in AMR among MDR pathogens is important for implementation of infection control and to guide appropriate empirical antimicrobial therapy.  DOI: 10.4103/0255-0857.195376 | NAT | **JUL TO DEC** | **PMID:**27934820 |
|  | Prasanna KS(1), Goel A(1), Amirtharaj GJ(2), Ramachandran A(2), BalasubramanianKA(2), Mackie I(3), Zachariah U(1), Sajith KG(1), Elias E(1,)(4), Eapen CE(5).  Plasma von Willebrand factor levels predict in-hospital survival in patients withacute-on-chronic liver failure.  Indian J Gastroenterol. 2016 Nov;35(6):432-440. Epub 2016 Nov 8.  **Author information:**  (1)Department of Hepatology, Christian Medical College, Vellore, 632 004, India. (2)Wellcome Biochemistry, Christian Medical College, Vellore, 632 004, India. (3)Haemostasis Research Unit, Haematology Department, University College London, London, UK. (4)Liver Unit, University Hospital Birmingham, Birmingham, UK. (5)Department of Hepatology, Christian Medical College, Vellore, 632 004, India. eapen@cmcvellore.ac.in.  BACKGROUND AND AIMS: Circulating levels of von Willebrand factor (vWF) predict mortality in patients with cirrhosis. We hypothesized that systemic inflammation in acute-on-chronic liver failure (ACLF) will stimulate endothelium, increase vWF levels, and promote platelet microthrombi causing organ failure.  METHODS: In this prospective study, we correlated plasma vWF levels with organ failure, liver disease severity, sepsis, and systemic inflammatory response syndrome (SIRS) and also analyzed if vWF levels predicted in-hospital composite poor outcome (i.e. death/discharged in terminal condition/liver transplantation) in consecutive ACLF patients.  RESULTS: Twenty-one of the 50 ACLF patients studied had composite poor outcome. ACLF patients had markedly elevated vWF antigen and activity (sevenfold and fivefold median increase, respectively) on days 1 and 3. Median ratio of vWF to a disintegrin and metalloprotease with thrombospondin type 1 motif, member 13 (ADAMTS13) activity on day 1 was significantly higher in ACLF patients (11.2) compared to 20 compensated cirrhosis patients (3.3) and healthy volunteers (0.9). On day 1, area under ROC curve (AUROC) to predict composite poor outcome of hospital stay for ACLF patients for vWF antigen, vWF activity, and model for end-stage liver disease (MELD) score were 0.63, 0.68, and 0.74, respectively. vWF activity correlated better with liver disease severity (MELD score, ACLF grade) and organ failure (Sequential Organ Failure Assessment [SOFA] score) than vWF antigen; in contrast, neither vWF antigen nor activity correlated with platelet count, sepsis, or SIRS.  CONCLUSIONS: vWF levels are markedly elevated, correlate with organ failure, and predict in-hospital survival in ACLF patients. This data provides a mechanistic basis for postulating that vWF-reducing treatments such as plasma exchange may benefit ACLF patients.  DOI: 10.1007/s12664-016-0708-2 | NAT | **JUL TO DEC** | **PMID:**27822882 |
|  | Premkumar R(1), Pothen J(2), Rima J(3), Arole S(4).  Prevalence of hypertension and prehypertension in a community-based primaryhealth care program villages at central India.  Indian Heart J. 2016 May-Jun;68(3):270-7. doi: 10.1016/j.ihj.2015.08.013. Epub2016 Jan 13.  **Author information:**  (1)Comprehensive Rural Health Project (Institute of Training & Research in Community Health & Population), Jamkhed, Maharashtra State, India. Electronic address: prem@jamkhed.org. (2)Comprehensive Rural Health Project (Institute of Training & Research in Community Health & Population), Jamkhed, Maharashtra State, India. Electronic address: j.pothen4@gmail.com. (3)Department of Distance Education, Christian Medical College, Vellore, India. Electronic address: jeevarima@gmail.com. (4)Comprehensive Rural Health Project (Institute of Training & Research in Community Health & Population), Jamkhed, Maharashtra State, India. Electronic address: [shobhatai@gmail.com](mailto:shobhatai@gmail.com).  OBJECTIVE: The objective of this study is to evaluate the effects of a community-based effort in a rural area of central India to decrease the prevalence of hypertension among the middle-aged and older population by using multiple blood pressure measurements. METHODS: With a prevalence of 16.8% (error of 3.36, and 95% confidence interval) from a recent study in a nearby district, the sample size required for this study was 495 subjects. A proportionally stratified random sample design was used. With maps of ten villages, where in a community-based health project had been in place for many years, 20 households and 20 backups were randomly selected from a list of all households. Multiple BP measurements were obtained and categorized and one-month period prevalence was calculated. Statistical analyses of frequency and percentage were performed. RESULTS: Approximately one-fifth of the population above 40 years of age in central India where a community-based approach is in place was hypertensive. This is significantly lower than the previously documented prevalence rate of one-third or even more prevalence rate in India. The attribute of caste and religion, a specific rural Indian characteristic did not have any significant bearing on the above results. The prevalence tended to increase progressively with age until 70 years, after which it declined. Multiple blood pressure measurements may yield an accurate prevalence of hypertension. CONCLUSION: With the documented evidences from India, the current reduced prevalence of hypertension could have been influenced by the community-based interventions in this population. Copyright © 2015 Cardiological Society of India. Published by Elsevier B.V. All rights reserved. DOI: 10.1016/j.ihj.2015.08.013 | NAT | **JAN TO JUN** | **PMCID: PMC**4911430  **PMID:**27316477 |
|  | Pricilla RA(1), David KV(2), Siva R(3), Vimala TJ(4), Rahman SP(2),Sankarapandian V(2).  Satisfaction of antenatal mothers with the care provided by nurse-midwives in anurban secondary care unit.  J Family Med Prim Care. 2016 Apr-Jun;5(2):420-423.  **Author information:**  (1)Department of Community Medicine, Low Cost Effective Care Unit, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Family Medicine, Low Cost Effective Care Unit, Christian Medical College, Vellore, Tamil Nadu, India. (3)Department of Community Health Nursing, College of Nursing, Christian Medical College, Vellore, Tamil Nadu, India. (4)Department of Medical Surgical Nursing, Christian Medical College, Vellore, Tamil Nadu, India.  BACKGROUND: The satisfaction of antenatal women to antenatal services has rarely been studied in India. In a nation with a maternal mortality ratio of 178/100,000 live births, it is crucial to explore all avenues to reduce it. AIMS: Our study aims to assess the pregnant women's satisfaction with regard to antenatal care services provided by nurse-midwives in an urban health center in South India. METHODS: We administered a satisfaction of care questionnaire to 200 consecutive antenatal women attending the nurse run antenatal clinics from April 2014 to November 2014. The date entry was done using Epi-Data system and the analysis by SPSS version 16. STATISTICAL ANALYSIS USED: The absolute distribution of each of the question in the satisfaction of care questionnaire was calculated as proportions. The relationship between satisfaction of care and parity, number of visits, years of experience of the care provider and mother's education was tested using Mann-Whitney test for two independent groups. RESULTS: The mean age of the mothers was 23.5 years. More than 95% of the mothers expressed satisfaction with the number of antenatal visits components of antenatal care. Only 31.8% of the mothers were satisfied with the health education on family planning. There was no significant relationship between satisfaction of care and parity of mothers or years of experience of care provider. CONCLUSIONS: Pregnant women attending a nurse run antenatal care service have positively expressed satisfaction of care provided therein. DOI: 10.4103/2249-4863.192359 | NAT | **JAN TO JUN** | **PMCID: PMC**5084573  **PMID:**27843853 |
|  | Putta T(1), Irodi A(1), Thangakunam B(2), Oliver A(2), Gunasingam R(3).  Young patient with generalized lymphangiomatosis: Differentiating thedifferential.  Indian J Radiol Imaging. 2016 Jul-Sep;26(3):411-415.  **Author information:**  (1)Department of Radiology, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Pulmonary Medicine, Christian Medical College, Vellore, Tamil Nadu, India. (3)Department of Radiotherapy, Christian Medical College, Vellore, Tamil Nadu, India.  We present the case of a 19-year-old man who was extensively evaluated in multiple centres for long-standing cough, dyspnea, and hemoptysis without a definitive diagnosis. His chest radiograph at presentation showed mediastinal widening, bilateral pleural effusions, and Kerley B lines. Computed tomography of the thorax showed a confluent, fluid-density mediastinal lesion enveloping the mediastinal viscera without any mass effect. There were bilateral pleural effusions, prominent peribronchovascular interstitial thickening, interlobular septal thickening and lobular areas of ground glass density with relative sparing of apices. There were a few dilated retroperitoneal lymphatics and well-defined lytic lesions in the bones. In this case report, we aim to systematically discuss the relevant differentials and arrive at a diagnosis. We also briefly discuss the treatment options and prognosis along with our patient's course in the hospital and final outcome.  DOI: 10.4103/0971-3026.190416 | NAT | **JUL TO DEC** | **PMCID: PMC**5036344  **PMID:**27857472 |
|  | Qureshi IN(1), David D(2), Thangaraj KR(3), Kurien RT(1), Chowdhury SD(1), GoelA(1), Dutta AK(1), Simon EG(1), Ramachandran A(3), Balasubramanian KA(3), JosephAJ(1).  Plasma hydrogen sulphide does not predict severity of acute pancreatitis inhumans.  Indian J Gastroenterol. 2016 Nov;35(6):478-481. Epub 2016 Oct 29.  **Author information:**  (1)Department of Gastroenterology, Division of Gastrointestinal Sciences, Christian Medical College Hospital, Vellore, 632 004, India. (2)Department of Gastroenterology, Division of Gastrointestinal Sciences, Christian Medical College Hospital, Vellore, 632 004, India. deepudavid@gmail.com. (3)Wellcome Research Laboratory, Division of Gastrointestinal Sciences, Christian Medical College Hospital, Vellore, 632 004, India.  The primary aim of this study was to assess the usefulness of plasma hydrogen sulphide (H2S) level at admission as a predictor of severity of acute pancreatitis. The secondary aims were to examine whether the level of H2S after 48 h correlated with severity and whether level of H2S correlated with pulmonary, renal or infectious complications. Plasma hydrogen sulphide was measured within 24 h of admission and 48 h later, in patients with acute pancreatitis. Patients were classified as having mild or severe pancreatitis, and H2S levels in the two groups were compared. A total of 55 patients had H2S estimation carried out within 24 h of admission. H2S levels were similar in patients with mild (mean 31.8 ± 18.8, range 7.1 to 81.4 µmol/L) and severe pancreatitis (mean 28.2 ± 21.6, range 6.1 to 74.4 µmol/L; p = 0.339). There was no difference found between the groups after 48 h (mild n = 28, mean 26.8 ± 19.4 µmol/L, and severe n = 20, mean 34.6 ± 21.0 µmol/L; p = 0.127). There was also no difference in the levels between patients with or without lung injury, kidney injury or sepsis. Performing H2S estimation to predict severity in acute pancreatitis is not beneficial.  DOI: 10.1007/s12664-016-0703-7 | NAT | **JUL TO DEC** | **PMID:**27796938 |
|  | Rab C(1), Vignesh(1), S S(1), T D(1).  Varicella encephalitis - Case series.  J Assoc Physicians India. 2016 Jan;64(1):57.  **Author information:**  (1)Christian Medical College, Vellore. | NAT | **JAN TO JUN** | **PMID:**27727781 |
|  | Rajamani B(1), Kumar Y(2), Rahman SM(2).  Neuroleptic malignant syndrome.  J Family Med Prim Care. 2016 Jan-Mar;5(1):178-80. doi: 10.4103/2249-4863.184660.  **Author information:**  (1)Low-Cost Effective Care Unit, CMC, Vellore, Tamil Nadu, India. (2)Department of Family Medicine, Christian Medical College, Vellore, Tamil Nadu, India.  Neuroleptic malignant syndrome (NMS) is a life-threatening emergency that is often seen as a complication of antipsychotic agents. It is characterized by a tetrad of motor, behavioral, autonomic, and laboratory abnormalities. We report a case of a 34-year-old man with a history of newly diagnosed Type 2 diabetes mellitus, mental retardation, and behavioral abnormalities who developed NMS after starting on antipsychotic agents. He presented with high temperature, muscle rigidity, tachycardia, and elevated blood pressure. After a week of hospital treatment in the general ward of a secondary care unit, he was discharged in a hemodynamically and mentally stable state. DOI: 10.4103/2249-4863.184660 | NAT | **JAN TO JUN** | **PMCID: PMC**4943133  **PMID:**27453870 |
|  | Rajendra A(1), Koshy M(1), Mishra AK(1), Hansdak SG(1).  Lithophagia: Presenting as spurious diarrhea.  J Family Med Prim Care. 2016 Apr-Jun;5(2):499-500.  **Author information:**  (1)Department of Medicine, Christian Medical College, Vellore, Tamil Nadu, India.  DOI: 10.4103/2249-4863.192328 | NAT | **JAN TO JUN** | **PMCID: PMC**5084597  **PMID:**27843877 |
|  | Rajendra A(1), Mishra AK(1), Francis NR(1), Carey RA(1).  Severe hypercalcemia in a patient with pulmonary tuberculosis.  J Family Med Prim Care. 2016 Apr-Jun;5(2):509-511.  **Author information:**  (1)Department of Medicine, Christian Medical College, Vellore, Tamil Nadu, India.  DOI: 10.4103/2249-4863.192327 | NAT | **JAN TO JUN** | **PMCID: PMC**5084602  **PMID:**27843882 |
|  | Rajendra A(1), Sabnis K(2), Jeyaseelan V(3), Rupali P(2).  Paradoxical reaction (PR) in tuberculous lymphadenitis among HIV-negativepatients: retrospective cohort study.  Postgrad Med J. 2016 Sep 16. pii: postgradmedj-2016-134326. doi:10.1136/postgradmedj-2016-134326. [Epub ahead of print]  **Author information:**  (1)Department of General Medicine, Christian Medical College and Hospital, Vellore, Tamil Nadu, India. (2)Department of Infectious Diseases, Christian Medical College, Vellore, Tamil Nadu, India. (3)Department of Biostatistics, Christian Medical College, Vellore, Tamil Nadu, India.  DOI: 10.1136/postgradmedj-2016-134326 | NAT | **JUL TO DEC** | **PMID:**27638382 |
|  | Rajkumar P(1), Mathew BS(2), Das S(3), Isaiah R(3), John S(4), Prabha R(5),Fleming DH(6).  Cisplatin Concentrations in Long and Short Duration Infusion: Implications forthe Optimal Time of Radiation Delivery.  J Clin Diagn Res. 2016 Jul;10(7):XC01-XC04. doi: 10.7860/JCDR/2016/18181.8126.Epub 2016 Jul 1.  **Author information:**  (1)Fellow, Clinical Pharmacology Unit, Department of Pharmacology and Clinical Pharmacology, Christian Medical College Hospital , Vellore, India . (2)Professor, Clinical Pharmacology Unit, Department of Pharmacology and Clinical Pharmacology, Christian Medical College Hospital , Vellore, India . (3)Associate Professor, Department of Radiation Oncology, Christian Medical College Hospital , Vellore, India . (4)Professor, Department of Radiation Oncology, Christian Medical College Hospital , Vellore, India . (5)Assistant Professor, Clinical Pharmacology Unit, Christian Medical College Hospital , Vellore, India . (6)Professor, Clinical Pharmacology Unit, Christian Medical College Hospital , Vellore, India .  INTRODUCTION: Cisplatin has radiosensitizing properties and the best sensitization to radiotherapy occurs with a higher plasma concentration of cisplatin. To our knowledge the optimal time sequence between chemotherapy and administration of radiation therapy, to obtain maximum effect from concurrent chemoradiation is unclear.  AIM: The aim of this study was to measure the two cisplatin infusion regimens in order to determine the total and free cisplatin post infusion concentration changes over time. These changes may have clinical implications on the optimum time of administration of post infusion radiation therapy.  MATERIALS AND METHODS: Two cohorts of patients were recruited and both, total and free plasma concentration of cisplatin following long and short durations of intravenous infusion was determined. Blood samples were collected at 0.5, 1, 1.5, 2, 3 and 5 hours from the start of the infusion in the 1hour infusion group and at 2, 3, 3.5, 4, 6 and 24 hours from the start of the infusion, in the 3 hour infusion group. Total and free cisplatin concentrations were measured using a validated HPLC-UV method.  RESULTS: The highest concentration of total and free cisplatin was achieved at the end of the infusion in both regimens. Total cisplatin concentration declined 30 minutes after the end of infusion in both the groups. After 1hour of discontinuing cisplatin, the free cisplatin concentration also declined significantly.  CONCLUSION: We conclude that radiation should be administered within 30 minutes of completion of the infusion irrespective of the duration of infusion.  DOI: 10.7860/JCDR/2016/18181.8126 | NAT | **JUL TO DEC** | **PMCID: PMC**5020194  **PMID:**27630935 |
|  | Rajshekhar V(1).  History of neurosurgery at Christian Medical College, Vellore: A pioneer's tale.  Neurol India. 2016 Mar-Apr;64(2):297-310. doi: 10.4103/0028-3886.177625.  **Author information:**  (1)Department of Neurological Sciences, Christian Medical College Hospital,  Vellore, Tamil Nadu, India.  The Department of Neurological Sciences at Christian Medical College (CMC), Vellore was the first department to start neurosurgical and neurological services in India. Jacob Chandy started the department in 1949 against several odds. He started a formal training program in neurosurgery in 1958, for the first time in India, and went on to qualify several neurosurgeons, who in turn pioneered neurosurgical departments all over India. After 1970, K V Mathai and Jacob Abraham guided the department through some difficult times when there was a severe shortage of personnel and no faculty in the neurology section. Through their commitment and hard work, they continued not only the neurosurgery service but also looked after patients with neurological disorders. Mathew J Chandy, son of Jacob Chandy, joined them in 1980 and introduced micro-neurosurgery and several other neurosurgical techniques. Training of residents in micro-neurosurgery began in the early 1980s. The last quarter of a century has been a period of rapid progress for neurosurgery at CMC. There has been an exponential rise in the number of surgeries, number of residents and number of publications. Research has always been an integral part of the activities of the department and several high impact articles have been published by the faculty and residents. The neurosurgical faculty at CMC has also contributed significantly to organized neurosurgery in India and internationally, with five of them serving as President of the Neurological Society of India, a society which had Jacob Chandy as its founder President. With this heritage, the neurosurgery section at CMC, Vellore is likely to continue to provide high quality ethical neurosurgical care to patients from all over India and overseas. DOI: 10.4103/0028-3886.177625 | NAT | **JAN TO JUN** | **PMID:**26954810 |
|  | Rajshekhar V(1).  Highest cited papers in Neurology India.  Neurol India. 2016 Nov-Dec;64(6):1400. doi: 10.4103/0028-3886.193838.  **Author information:**  (1)Department of Neurological Sciences, Christian Medical College Hospital, Vellore, India.  DOI: 10.4103/0028-3886.193838 | NAT | **JUL TO DEC** | **PMID:**27841252 |
|  | Rajshekhar V(1).  Author's reply.  Neurol India. 2016 Jul-Aug;64(4):839-40. doi: 10.4103/0028-3886.185376.  **Author information:**  (1)Department of Neurological Sciences, Christian Medical College Hospital, Vellore - 632 004, Tamil Nadu, India.  DOI: 10.4103/0028-3886.185376 | NAT | **JUL TO DEC** | **PMID:**27381155 |
|  | Rajshekhar V(1).  Neurocysticercosis: Diagnostic problems & current therapeutic strategies.  Indian J Med Res. 2016 Sep;144(3):319-326. doi: 10.4103/0971-5916.198686.  **Author information:**  (1)Department of Neurological Sciences, Christian Medical College & Hospital, Vellore, India.  Neurocysticercosis (NCC) is the most common single cause of seizures/epilepsy in India and several other endemic countries throughout the world. It is also the most common parasitic disease of the brain caused by the cestode Taenia solium or pork tapeworm. The diagnosis of NCC and the tapeworm carrier (taeniasis) can be relatively inaccessible and expensive for most of the patients. In spite of the introduction of several new immunological tests, neuroimaging remains the main diagnostic test for NCC. The treatment of NCC is also mired in controversy although, there is emerging evidence that albendazole (a cysticidal drug) may be beneficial for patients by reducing the number of seizures and hastening the resolution of live cysts. Currently, there are several diagnostic and management issues which remain unresolved. This review will highlight some of these issues.  DOI: 10.4103/0971-5916.198686 | NAT | **JUL TO DEC** | PMID: 28139530 |
|  | Ram M(1), Ramakant P(1), Parmar H(2), George B(3), Paul MJ(1).  Primary Breast T Cell Lymphoma Involving Nipple-Areolar Complex in a Young Patient.  Indian J Surg. 2016 Dec;78(6):499-501. doi: 10.1007/s12262-016-1442-9. Epub 2016 Jan 25.  **Author information:**  (1)Endocrine and Breast Surgery Department, Christian Medical College, Vellore, India. (2)Pathology Department, Christian Medical College, Vellore, India. (3)Hematology Department, Christian Medical College, Vellore, India.  We present a rare case of recurrent primary breast lymphoma involving the nipple-areolar complex and review literature on primary breast lymphoma, its clinical presentation and management. It is diagnosed by histopathology. It needs multimodality management protocols. DOI: 10.1007/s12262-016-1442-9 | NAT | **JUL TO DEC** | PMID: 28100950 PMCID: PMC5218938 [Available on 2017-12-01] |
|  | Ramachandran K(1), Mani SK(2), Gopal GK(3), Rangasami S(4).  Prevalence of Bone Mineral Density Abnormalities and Factors Affecting BoneDensity in Patients with Chronic Obstructive Pulmonary Disease in a Tertiary CareHospital in Southern India.  J Clin Diagn Res. 2016 Sep;10(9):OC32-OC34. Epub 2016 Sep 1.  **Author information:**  (1)Assistant Professor, Department of Respiratory Medicine, Meenakshi Medical College Hospital and Research Institute , Kanchipuram, Tamil Nadu, India . (2)Senior Resident, Department of Respiratory Medicine, Saveetha Medical College , Chennai, Tamil Nadu, India . (3)Professor, Department of Geriatrics, Christian Medical College and Hospital , Vellore, Tamil Nadu, India . (4)Professor, Department of Respiratory Medicine, Meenakshi Medical College Hospital and Research Institute , Kanchipuram, Tamil Nadu, India.  INTRODUCTION: Chronic Obstructive Pulmonary Disease (COPD) is a disease of wasting with airflow limitation, associated with a variety of systemic manifestations such as reduced Bone Mineral Density (BMD). There is a paucity of Indian studies on the effects of COPD on BMD.  AIM: This study was conducted to estimate the prevalence of osteopenia and osteoporosis in COPD patients and the correlation between bone density and severity of COPD classified according to GOLD Global initiative for chronic Obstructive Lung Disease guidelines (GOLD).  MATERIALS AND METHODS: A prospective study of 60 patients diagnosed to have COPD, was conducted in the outpatient department of Respiratory Medicine, at a tertiary care hospital in Southern India, between September 2012 and September 2013. BMD was measured using ultrasound bone densitometer (ACHILLES GE HEALTH CARE). Patients with a T-score between -1 and -2.5 were considered to be osteopenic while patients with a T score less than -2.5 were considered to be osteoporotic (WHO criteria).  RESULTS: Overall, 40 (67%) patients had an abnormal bone mineral density. A total of 21 (35%) patients were osteoporotic while 19 (33%) were osteopenic. BMD levels correlated with severity of obstruction (p<0.001), smoking status (p=0.02), age (p=0.05) and number of pack years (p=0.001).  CONCLUSION: Patients with COPD are at an increased risk for lower BMD and osteoporotic fractures and the risk appears to increase with disease severity. Further studies are required to assess whether routine BMD measurements in COPD patients is beneficial to diagnose osteoporosis and reduce morbidity.  DOI: 10.7860/JCDR/2016/22464.8551 | NAT | **JUL TO DEC** | **PMCID: PMC**5071990  **PMID:**27790490 |
|  | Ramachandran K(1), Thankagunam B(2), Karuppusami R(3), Christopher DJ(4).  Physician Related Delays in the Diagnosis of Lung Cancer in India.  J Clin Diagn Res. 2016 Nov;10(11):OC05-OC08. doi: 10.7860/JCDR/2016/22737.8823. Epub 2016 Nov 1.  **Author information:**  (1)Assistant Professor, Department of Respiratory Medicine, Meenakshi Medical College Hospital and Research Institute , Enathur, Kanchipuram, Tamil Nadu, India . (2)Professor, Department of Pulmonary Medicine, Christian Medical College and Hospital , Vellore, Tamil Nadu, India . (3)Senior Demonstrator, Department of Biostatistics, Christian Medical College and Hospital , Vellore, Tamil Nadu, India . (4)Professor and Head, Department of Pulmonary Medicine, Christian Medical College and Hospital , Vellore, Tamil Nadu, India .  INTRODUCTION: Lung cancer is associated with a poor prognosis, if detected late in the disease course. Delay in seeking health care, wrong diagnosis and delay in specialist referral can contribute to delay in diagnosis. AIM: This study was done to assess physician related delays in the diagnosis of lung cancer and the treatments given before presenting to our center. MATERIALS AND METHODS: A total of 96 consecutive patients diagnosed with lung cancer were enrolled in this study. Details of previous physician consultations, their specialization, diagnoses made and treatments given were obtained from records available with the patients. RESULTS: Patients, on an average consulted two physicians before presenting to our center. Less than half of the physicians (45%) suspected lung cancer during their evaluation. Around 18% of physicians made an incorrect diagnosis of tuberculosis, out of whom, 88.6% had prescribed anti-tuberculous therapy. Only 27% of physicians referred the patients to higher medical centres for evaluation. Pulmonology Specialists (PS) were the most likely to diagnose lung cancer (p<0.0001). General Medicine Specialists (GMS) were the most likely to misdiagnose cancer as tuberculosis, followed by General Practioners (GP) when compared to PS (p-value =0.0422). CONCLUSION: Our study demonstrates that, many physicians have a low index of suspicion to diagnose lung malignancy and most commonly misdiagnose it as tuberculosis. It is likely that most patients failed to seek the services of PS directly or through referral either due to a shortage of PS or due to other reasons.  DOI: 10.7860/JCDR/2016/22737.8823 | NAT | **JUL TO DEC** | PMID: 28050418 PMCID: PMC5198371 |
|  | Ramassamy S(1), Gibikote S(2), George RE(1).  Anonychia with absent phalanges and brachydactyly: A report of two unrelatedcases.  Indian J Dermatol Venereol Leprol. 2016 Nov-Dec;82(6):693-695. doi:10.4103/0378-6323.184198.  **Author information:**  (1)Department of Dermatology, Venereology and Leprosy, Christian Medical College and Hospital, Vellore, Tamil Nadu, India. (2)Department of Radiology, Venereology and Leprosy, Christian Medical College and Hospital, Vellore, Tamil Nadu, India.  DOI: 10.4103/0378-6323.184198 | NAT | **JUL TO DEC** | **PMID:**27320764 |
|  | Ranjan P(1), Fletcher GJ(1), Radhakrishnan M(1), Sivakumar J(1), Premkumar PS(2),Goel A(3), Zachariah UG(3), Abraham P(1).  Association of interleukin-28B rs12979860 and rs8099917 polymorphisms withsustained viral response in hepatitis C virus genotype 1 and 3 infected patientsfrom the Indian subcontinent.  Indian J Med Microbiol. 2016 Jul-Sep;34(3):335-41. doi: 10.4103/0255-0857.188329.  **Author information:**  (1)Department of Clinical Virology, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Biostatistics, Christian Medical College, Vellore, Tamil Nadu, India. (3)Department of Hepatology, Christian Medical College, Vellore, Tamil Nadu, India.  BACKGROUND: Polymorphisms of the IL28B gene (rs12979860 and rs8099917) have been shown to impact treatment responses in hepatitis C virus (HCV) infected patients. The association of these polymorphisms with sustained viral response (SVR) has been studied in HCV genotype 3 infected patients in India, but not in genotype 1.  OBJECTIVES: This study aimed to determine the association of IL28B gene polymorphisms and other host and viral factors with treatment response in patients with HCV genotype 1 and 3 infection.  MATERIALS AND METHODS: DNA from 42 HCV-infected patients on antiviral therapy was analysed for the IL28B polymorphisms using polymerase chain reaction-restriction fragment length polymorphism (PCR-RFLP). Bidirectional sequencing was performed on a subset of samples for verification of PCR-RFLP results. Information on age, weight, height, diabetic status, pre-treatment viral load and alanine aminotransferase (ALT) levels was obtained from clinical records. The IL28B genotypes and the other factors were analysed for their association with SVR.  RESULTS: The frequency distribution of rs12979860 CC/CT/TT genotypes was found to be 66.7%, 26.2% and 7.1%, respectively. For rs8099917 genotype, the TT/GT/GG distribution was 73.8%, 21.4% and 4.8%, respectively. SVR was seen in 61.9% of cases (55.6% in genotype 1 and 62.5% in genotype 3). CC genotype at rs12979860 and TT genotype at rs8099917 were significantly higher in responders (P = 0.013 and 0.042, respectively). Lower baseline ALT and rapid viral response were also found to be associated with SVR. On logistic regression analysis, CC genotype at rs12979860 emerged as the most powerful predictor of treatment response.  CONCLUSION: IL28B polymorphisms are strong predictors of SVR in patients from the Indian subcontinent infected with HCV genotype 3 and genotype 1.  DOI: 10.4103/0255-0857.188329 | NAT | **JUL TO DEC** | **PMID:**27514956 |
|  | Rao SV(1), Jacob GG(1), Raju NA(1), Ancheri SA(2).  Spontaneous arterial hemorrhage as a complication of dengue.  Indian J Crit Care Med. 2016 May;20(5):302-4. doi: 10.4103/0972-5229.182201.  **Author information:**  (1)Division of Critical Care, Christian Medical Collee, Vellore, Tamil Nadu, India. (2)Department of Anaesthesiology, Christian Medical College, Vellore, Tamil Nadu, India.  Bleeding complications of dengue hemorrhagic fever such as epistaxis, gum bleeding, gastrointestinal bleeding, hypermenorrhea, hematuria, and thrombocytopenia have been documented. A 49-year-old female presented with complaints of intermittent high-grade fever for the past 4 days, lower abdominal pain and altered sensorium for 1 day. Laboratory investigations revealed severe anemia, mild thrombocytopenia, hypofibrinogenemia, and positive dengue serology. Emergency ultrasound examination of the abdomen revealed a possible rapidly expanding hematoma from the inferior epigastric artery and suggested urgent computed tomography (CT) angiogram for confirmation of the same. CT angiogram was confirmatory, and patient underwent emergency embolization of the right inferior epigastric artery. We report the first case of inferior epigastric hemorrhage and rectus sheath hematoma as a consequence of dengue. DOI: 10.4103/0972-5229.182201 | NAT | **JAN TO JUN** | **PMCID: PMC**4876654  **PMID:**27275081 |
|  | Raveendran S(1), Naik D(2), Raj Pallapati SC(1), Prakash JJ(3), Thomas BP(1),Thomas N(2).  The clinical and microbiological profile of the diabetic hand: A retrospectivestudy from South India.  Indian J Endocrinol Metab. 2016 Sep-Oct;20(5):619-624.  **Author information:**  (1)Dr. Paul Brand Centre for Hand Surgery, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Endocrinology, Diabetes and Metabolism, Christian Medical College, Vellore, Tamil Nadu, India. (3)Department of Microbiology, Christian Medical College, Vellore, Tamil Nadu, India.  BACKGROUND: Pyogenic Infections of the hand in diabetes are largely a tropical entity and published material in the area are rather meagre.  PATIENTS AND METHODS: This is a retrospective study on the pattern of hand infections and involves the microbiological profile of 39 cases of diabetes hand-related infections admitted to the hospital between the years 2004 and 2010.  RESULTS: This study included 39 patients, among whom 23 (59%) had necrotizing fasciitis (NF), and 16 (9-abscess and 7-tenosynovitis) had nonnecrotizing infection. Among 25 culture positive patients, polymicrobial infections were isolated in 13 (52%) patients, a single organism was isolated in 9 (36%) and 3 (12%) had sterile cultures. Out of the 41 different bacterial isolates, 51.12% were Gram-negative and 48.78% were Gram-positive. Patients with NF had a higher mean glycated hemoglobin (10.83 ± 2.59 vs. 8.64 ± 1.8%, P = 0.020), when compared to the nonnecrotizing group. Patients with NF also had more polymicrobial infections (P = 0.017), and a longer duration of hospitalization when compared to patients without NF (21.8 ± 9.96 vs. 12.7 ± 14.5 days, P = 0.021). Seven (17.94%) patients required amputation of the affected digits of which six (15.38%) had NF.  CONCLUSION: Patients with poor glycemic control, polymicrobial infection, delay in presentation, and a prior surgical intervention at another medical center was associated with more severe necrotizing infections. The duration of hospitalization and amputation rates was greater among patients with NF.  DOI: 10.4103/2230-8210.190539 | NAT | **JUL TO DEC** | **PMCID: PMC**5040040  **PMID:**27730070 |
|  | Rekha BM(1), Chandramohan A(2), Chandran BS(3), Jayaseelan V(4), Suganthy J(5).  Contrast Enhanced Computed Tomographic Study on the Prevalence of DuodenalDiverticulum in Indian Population.  J Clin Diagn Res. 2016 Apr;10(4):AC12-5. doi: 10.7860/JCDR/2016/17582.7649. Epub2016 Apr 1.  **Author information:**  (1)Assistant Professor, Department of Anatomy, Christian Medical College , Bagayam, Vellore, India . (2)Associate Professor, Department of Radiology, Christian Medical College , Vellore, India . (3)Professor and Head, Department of Surgery, Christian Medical College , Vellore, India . (4)Lecturer, Department of Biostatistics, Christian Medical College , Vellore, India . (5)Professor and Head, Department of Anatomy, Christian Medical College , Vellore, India .  INTRODUCTION: Duodenal diverticulum (DD) is the second most common diverticulum, yet its incidence varies widely from 1-22% based on the mode of investigation.Computed Tomography (CT) of abdomen is the preferred modality to diagnose acute abdomen including those of complications of DD. Moreover, the prevalence of DD in Indian population is not yet been studied using CT. AIM: The current study aim to look for the prevalence of DD in Indian population using Contrast Enhanced Computed Tomography (CECT) abdomen. MATERIALS AND METHODS: A retrospective study was done to assess the presence of DD using the CECT abdomen of 565 patients. The number, size, location, wall thickness and the contents of the diverticulum were noted. The data obtained was analysed using SPSS version 17.0. The mean, percentage of frequency of each variable and the association of DD with pancreatitis, cholelithiasis and colonic diverticulum were also looked for. Frequencies and percentages were calculated for all categorical variables. Spearman's rho correlation was done for age, diameter and content of DD. RESULTS: The prevalence of DD in Indian population was 8.3% with the mean diameter of 17.13mm+7.26. The prevalence increased with age with no sex predilection. 89.3% were solitary and 10.64% were multiple. It was predominantly seen in the second part of duodenum (90.38%) and juxtapapillary type was the commonest. As the diameter of DD increased, fluid became its content. No significant association was observed between the presence of DD with pancreatitis, cholelithiasis or colonic diverticulum. A case of periampullary carcinoma arising from DD, a rare entity is being reported in this study. CONCLUSION: The prevalence of DD in Indian population is high compared to western population. DD has been attributed to the cases of acute abdomen and fluid alone as a content of DD with an incidence of 1.92% can be mistaken for a cystic neoplasm of pancreas. Rarely, a periampullary carcinoma can also arise from the wall of the pre-existing DD. This knowledge should be emphasised upon by theradiologist, surgeons and gastroenterologist who will be dealing with cases of acute abdomen and periampullary carcinoma. DOI: 10.7860/JCDR/2016/17582.7649 | NAT | **JAN TO JUN** | **PMCID: PMC**4866084  **PMID:**27190786 |
|  | Rogawski ET(1), Meshnick SR(1), Becker-Dreps S(2), Adair LS(3), Sandler RS(4),Sarkar R(5), Kattula D(5), Ward HD(6), Kang G(5), Westreich DJ(1).  Reduction in diarrhoeal rates through interventions that prevent unnecessaryantibiotic exposure early in life in an observational birth cohort.  J Epidemiol Community Health. 2016 May;70(5):500-5. doi:10.1136/jech-2015-206635. Epub 2015 Nov 30.  **Author information:**  (1)Department of Epidemiology, UNC-Chapel Hill, Chapel Hill, North Carolina, USA. (2)Department of Family Medicine, UNC-Chapel Hill, Chapel Hill, North Carolina, USA. (3)Department of Nutrition, UNC-Chapel Hill, Chapel Hill, North Carolina, USA. (4)Department of Epidemiology, UNC-Chapel Hill, Chapel Hill, North Carolina, USA Department of Medicine, UNC-Chapel Hill, Chapel Hill, North Carolina, USA. (5)Division of Gastrointestinal Sciences, Christian Medical College, Vellore, Tamil Nadu, India. (6)Division of Gastrointestinal Sciences, Christian Medical College, Vellore, Tamil Nadu, India Division of Geographic Medicine and Infectious Diseases, Tufts Medical Center, Boston, Massachusetts, USA.  BACKGROUND: Antibiotic treatment early in life is often not needed and has been associated with increased rates of subsequent diarrhoea. We estimated the impact of realistic interventions, which would prevent unnecessary antibiotic exposures before 6 months of age, on reducing childhood diarrhoeal rates. METHODS: In data from a prospective observational cohort study conducted in Vellore, India, we used the parametric g-formula to model diarrhoeal incidence rate differences contrasting the observed incidence of diarrhoea to the incidence expected under hypothetical interventions. The interventions prevented unnecessary antibiotic treatments for non-bloody diarrhoea, vomiting and upper respiratory infections before 6 months of age. We also modelled targeted interventions, in which unnecessary antibiotic use was prevented only among children who had already stopped exclusive breast feeding. RESULTS: More than half of all antibiotic exposures before 6 months (58.9%) were likely unnecessary. The incidence rate difference associated with removing unnecessary antibiotic use before 6 months of age was -0.28 (95% CI -0.46 to -0.08) episodes per 30 child-months. This implies that preventing unnecessary antibiotic exposures in just 4 children would reduce the incidence of diarrhea by 1 from 6 months to 3 years of age. CONCLUSIONS: Interventions to reduce unnecessary antibiotic use among young children could result in an important reduction in diarrhoeal rates. This work provides an example application of statistical methods which can further the aim of presenting epidemiological findings that are relevant to public health practice. Published by the BMJ Publishing Group Limited. For permission to use (where not already granted under a licence) please go to <http://www.bmj.com/company/products-services/rights-and-licensing/> DOI: 10.1136/jech-2015-206635 | NAT | **JAN TO JUN** | **PMCID: PMC**5030489  **PMID:**26621194 |
|  | Ross B(1), Kumar M, Srinivasan H, Ekbote AV.  Isoleucine Deficiency in a Neonate Treated for Maple Syrup Urine DiseaseMasquerading as Acrodermatitis Enteropathica.  Indian Pediatr. 2016 Aug 8;53(8):738-40.  **Author information:**  (1)Departments of Neonatology, JUL TO DECPediatrics and #Clinical Genetics Unit,Christian Medical College, Vellore, Tamilnadu, India. Correspondence to: Dr Benjamin Ross, Department of Neonatology, Christian Medical College, Vellore 632 004, Tamilnadu, India. benjaminross@cmcvellore.ac.in.  BACKGROUND: Special diet with restricted branched-chain-amino-acids used for treating maple syrup urine disease can lead to specific amino acid deficiencies.  CASE CHARACTERISTICS: We report a neonate who developed skin lesions due to isoleucine deficiency while using specialised formula.  INTERVENTION/OUTCOME: Feeds were supplemented with expressed breast milk. This caused biochemical and clinical improvement with resolution of skin lesions.  MESSAGE: Breast milk is a valuable and necessary adjunct to specialized formula in maple syrup urine disease to prevent specific amino acid deficiency in the neonatal period. | NAT | **JUL TO DEC** | **PMID:**27567652 |
|  | Rupa V(1), Abraham V(2), Singh C(3), Cherian VM(4), Abraham P(5).  MCI guidelines on publications for academic Promotions.  Natl Med J India. 2016 Mar-Apr;29(2):113.  **Author information:**  (1)Department of ENT, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Community Medicine, Christian Medical College, Vellore, Tamil Nadu, India. (3)Department of Urology, Christian Medical College, Vellore, Tamil Nadu, India. (4)Department of Orthopaedics, Christian Medical College, Vellore, Tamil Nadu, India. (5)Department of Clinical Virology, Christian Medical College, Vellore, Tamil Nadu, India. | NAT | **JAN TO JUN** | **PMID:**27586224 |
|  | Sachithanandham J, Ramalingam VV, Raja J, Abraham OC, Pulimood SA, KannangaiR(1).  Expression of cytokine-mRNA in peripheral blood mononuclear cell of humanimmunodeficiency virus-1 subtype C infected individuals with opportunistic viralinfections from India (South).  Indian J Med Microbiol. 2016 Jan-Mar;34(1):76-81. doi: 10.4103/0255-0857.174118.  **Author information:**  (1)Department of Clinical Virology, Christian Medical College, Vellore, Tamil Nadu, India.  Human immunodeficiency virus (HIV) disease progression is associated with a marked change in the level of plasma cytokines. The study reported here investigated the level of mRNA expression of different cytokines: Tumour necrosis factor-alpha (TNF-α), interferon (INF)-gamma, interleukin-10 (IL-10) and IL-21 in the peripheral blood mononuclear cell among the antiretroviral therapy naïve subtype C HIV-1 infected individuals and normal healthy controls by real time polymerase chain reaction. The mRNA expressions of all the 4 cytokines in HIV-1 infected individuals were significantly higher compared to healthy controls (P value range 0.0004-0.01). The mean level of IL-10, INF-gamma and TNF-α were higher in HIV infected individuals with low CD4 counts (<300 cells/μl). The IL-10 expression showed a significant negative correlation with CD4 counts (r=-0.25, P=0.04) while IL-21 showed a positive correlation with CD4 counts (r=0.26, P=0.03). There was a significant negative correlation between the cytomegalovirus (CMV) viral load and IL-21 expression. Cytokine levels by mRNA detection avoids the inherent problem of measuring plasma level and this study also provide information on the cytokine levels and CD4+ T cell level among HIV-1 subtype C infected individuals with opportunistic viral infections like CMV. DOI: 10.4103/0255-0857.174118 | NAT | **JAN TO JUN** | **PMID:**26776123 |
|  | Samuel SS(1), Shetty S(2), Arunachal G(3), Koshy S(4), Paul TV(5).  Hajdu Cheney Syndrome.  J Clin Diagn Res. 2016 Feb;10(2):OD07-9. doi: 10.7860/JCDR/2016/15782.7203. Epub2016 Feb 1.  **Author information:**  (1)Assistant Professor, Department of Dental Surgery, Christian Medical College , Vellore, India . (2)Senior Registrar, Department of Endocrinology, Diabetes & Metabolism, Christian Medical College , Vellore, India . (3)Assistant Professor, Department of Clinical Genetics, Christian Medical College , Vellore, India (4)Professor, Department of Dental Surgery, Christian Medical College , Vellore, India . (5)Professor, Department of Endocrinology, Diabetes & Metabolism, Christian Medical College , Vellore, India .  Hajdu-Cheney Syndrome is a rare genetic disorder characterised by progressive focal bone destruction. It is known to be an autosomal dominant disorder but there have been reports of sporadic cases as well. Although the disease manifestation is found to begin from birth, it is most often not diagnosed until adolescence or adulthood. It could be due to the rarity of the condition and the variation of the disease manifestation at different age groups. We report a case of Hajdu-Cheney Syndrome in a 26-year-old male who presented with severe periodontitis and premature loss of teeth. The other characteristic features included craniofacial dysmorphism, abnormalities of the digits and dental anomalies. Patients with craniofacial dysmorphism along with dental abnormalities should be thoroughly examined for any underlying systemic disorder. A team of specialists may be able to diagnose this condition before the disease is advanced. DOI: 10.7860/JCDR/2016/15782.7203 | NAT | **JAN TO JUN** | **PMCID: PMC**4800570  **PMID:**27042504 |
|  | Samuel VJ(1), Gibikote S(2), Kirupakaran H(3).  The routine pre-employment screening chest radiograph: Should it be routine?  Indian J Radiol Imaging. 2016 Jul-Sep;26(3):402-404.  **Author information:**  (1)Radiologist, Christian Fellowship Hospital, Oddanchatram, Tamil Nadu, India. (2)Department of Radiology, Christian Medical College, Vellore, Tamil Nadu, India. (3)Department of Staff Health, Christian Medical College, Vellore, Tamil Nadu, India.  BACKGROUND AND OBJECTIVE: A routine chest radiograph is mandatory in many institutions as a part of pre-employment screening. The usefulness of this has been studied over the years keeping in mind the added time, cost, and radiation concerns. Studies conducted outside India have shown different results, some for and some against it. To our knowledge, there is no published data from India on this issue.  MATERIALS AND METHODS: A retrospective review of the reports of 4113 pre-employment chest radiographs done between 2007 and 2009 was conducted.  RESULTS: Out of 4113 radiographs, 24 (0.58%) candidates required further evaluation based on findings from the screening chest radiograph. Out of these, 7 (0.17%) candidates required appropriate further treatment.  INTERPRETATION AND CONCLUSIONS: The percentage of significant abnormalities detected which needed further medical intervention was small (0.17%). Although the individual radiation exposure is very small, the large numbers done nation-wide would significantly add to the community radiation, with added significant cost and time implications. We believe that pre-employment chest radiographs should be restricted to candidates in whom there is relevant history and/or clinical findings suggestive of cardiopulmonary disease.  DOI: 10.4103/0971-3026.190409 | NAT | **JUL TO DEC** | **PMCID: PMC**5036342  **PMID:**27857470 |
|  | Sarkar R(1), Gladstone BP, Warier JP, Sharma SL, Raman U, Muliyil J, Kang G.  Rotavirus and other Diarrheal Disease in a Birth Cohort from Southern IndianCommunity.  Indian Pediatr. 2016 Jul 8;53(7):583-8.  **Author information:**  (1)Division of Gastrointestinal Sciences, and JUL TO DECCommunity Health Department, Christian Medical College, Vellore, Tamil Nadu, India. Correspondence to: Dr Gagandeep Kang, Division of Gastrointestinal Sciences, Christian Medical College, Vellore 632 004, Tamil Nadu, India. gkang@cmcvellore.ac.in.  OBJECTIVE: To describe the incidence, severity and etiology of diarrheal disease in infants and young children residing in an urban slum community in Southern India.  SETTING: Three contiguous urban slums in Vellore, Tamil Nadu.  PARTICIPANTS: 452 children participating in a birth cohort study on diarrheal disease; 373 completed three years of follow-up.  OUTCOME MEASURES: Diarrheal incidence (obtained by twice-weekly home visits) and severity (assessed by the Vesikari scoring system), and etiological agents associated with diarrhea (through examination of stool specimens by bacteriologic culture, rotavirus enzyme immunoassay, PCR for norovirus and microscopy for parasites).  RESULTS: A total of 1856 diarrheal episodes were reported in 373 children. The overall incidence rate of diarrhea was 1.66 episodes per child year for three years, with 2.76 episodes per child year in infancy. The incidence peaked during the months of July and August. Severe diarrhea formed 8% of the total episodes. Rotavirus was the most common pathogen detected, being identified in 18% of episodes. Good hygiene status resulted in 33% protection against moderate-to-severe diarrhea.  CONCLUSIONS: This study highlights the burden of diarrheal disease and the important etiological agents of childhood diarrhea in Southern India. Promotion of hygienic behavior through health education may help reduce diarrheal incidence in this and similar communities. | NAT | **JUL TO DEC** | **PMID:**27508534 |
|  | Sathyanarayana Rao TS(1), Rao GP(2), Raju MS(3), Saha G(4), Jagiwala M(5), Jacob KS(6).  Gay rights, psychiatric fraternity, and India.  Indian J Psychiatry. 2016 Jul-Sep;58(3):241-243. doi: 10.4103/0019-5545.192006.  **Author information:**  (1)Department of Psychiatry, JSS Medical College, JSS University, Mysore, Karnataka, India. (2)Division of Schizophrenia and Psychopharmacology, Asha Hospital Banjara Hills, Hyderabad, Telangana, India. 3)Hon. Adjunct Professor, IRSHA, Pune - 411043 and Hon. Consultant, Shanti Nursing Home, Aurangabad, Maharashtra, India. (4)Clinic Brain, 19/C, Pioneer Park, P. O Barasat North 24 Parganas, Kolkata, West Bengal, India. (5)Neuro Psychiatrist, Brain Psycho Clinic and De-Addiction Centre, Chowk Bazar, Surat, Gujarat, India. (6)Department of Psychiatry, Christian Medical College, Vellore, Tamil Nadu, India.  DOI: 10.4103/0019-5545.192006 | NAT | **JUL TO DEC** | PMCID: PMC5100112  PMID: 28065998 |
|  | Shetty S(1), Kapoor N(1), Bondu JD(2), Thomas N(1), Paul TV(1).  Bone turnover markers: Emerging tool in the management of osteoporosis.  Indian J Endocrinol Metab. 2016 Nov-Dec;20(6):846-852.  **Author information:**  (1)Department of Endocrinology, Diabetes and Metabolism, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Clinical Biochemistry, Christian Medical College, Vellore, Tamil Nadu, India.  Bone is a dynamic tissue which undergoes constant remodeling throughout the life span. Bone turnover is balanced with coupling of bone formation and resorption at various rates leading to continuous remodeling of bone. A study of bone turnover markers (BTMs) provides an insight of the dynamics of bone turnover in many metabolic bone disorders. An increase in bone turnover seen with aging and pathological states such as osteoporosis leads to deterioration of bone microarchitecture and thus contributes to an increase in the risk of fracture independent of low bone mineral density (BMD). These microarchitectural alterations affecting the bone quality can be assessed by BTMs and thus may serve as a complementary tool to BMD in the assessment of fracture risk. A systematic search of literature regarding BTMs was carried out using the PubMed database for the purpose of this review. Various reliable, rapid, and cost-effective automated assays of BTMs with good sensitivity are available for the management of osteoporosis. However, BTMs are subjected to various preanalytical and analytical variations necessitating strict sample collection and assays methods along with utilizing ethnicity-based reference standards for different populations. Estimation of fracture risk and monitoring the adherence and response to therapy, which is a challenge in a chronic, asymptomatic disease such as osteoporosis, are the most important applications of measuring BTMs. This review describes the physiology of bone remodeling, various conventional and novel BTMs, and BTM assays and their role in the assessment of fracture risk and monitoring response to treatment with antiresorptive or anabolic agents.  DOI: 10.4103/2230-8210.192914 | NAT | **JUL TO DEC** | **PMID:**27867890 |
|  | Shetty S(1), Shetty S(1), Prabhu AJ(2), Kapoor N(1), Hepzibah J(3), Paul TV(1).  An unusual presentation of metastatic bone disease in a subject with Paget'sdisease of bone.  J Family Med Prim Care. 2016 Apr-Jun;5(2):488-490.  **Author information:**  (1)Department of Endocrinology, Diabetes and Metabolism, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of General Pathology, Christian Medical College, Vellore, Tamil Nadu, India. (3)Department of Nuclear Medicine, Christian Medical College, Vellore, Tamil Nadu, India.  Solid organ malignancies involving breast, prostate, and lung frequently metastasize to the skeleton. However, the occurrence of Paget's disease and metastatic bone disease in the same patient is uncommon. We report a case of a 63-year-old man who presented with back pain and a lump in the right breast. He was earlier diagnosed to have Paget's disease of bone based on characteristic skeletal radiological features,(99m)Tc methylene diphosphonate bone scan and elevated alkaline phosphatase, and treated with bisphosphonates, and his disease was in remission. Further evaluation revealed an underlying skeletal metastatic disease secondary to a breast malignancy. He underwent radical mastectomy with axillary node clearance, radiotherapy, and chemotherapy. In addition, he also received parenteral bisphosphonates for his skeletal metastatic bone disease. DOI: 10.4103/2249-4863.192326 | NAT | **JAN TO JUN** | **PMCID: PMC**5084592  **PMID:**27843872 |
|  | Simon SS(1), Charlu AP(1), Chacko RK(2), Kumar S(3).  A Novel Technique To Correct Multiplanar Maxillary Hypoplasia.  J Clin Diagn Res. 2016 Apr;10(4):ZD09-11. doi: 10.7860/JCDR/2016/16599.7639. Epub2016 Apr 1.  **Author information:**  (1)Associate Professor, Department of Dental Surgery, Unit 1, Christian Medical College and Hospital , Vellore, Tamil Nadu, India . (2)Professor, Department of Dental Surgery, Unit 1, Christian Medical College and Hospital , Vellore, Tamil Nadu, India . (3)Assistant Professor, Department of Dental Surgery, Unit 1, Christian Medical College and Hospital , Vellore, Tamil Nadu, India .  Dental malocclusion and facial deformity are frequent observations in patients with clefts of the orofacial region. These patients have a low self perception secondary to their aesthetic appearance. Cleft palate patients are further affected in their speech and oral function with direct impediment to their quality of life. Early identification and treatment in cleft lip and palate patients may directly enhance their overall well being and productivity with sustainable prognosis when managed by skilled and evidence informed operators. We present a successful case management of a patient with a cleft palate and dentofacial deformity with a past surgical history, treated with an anterior maxillary advancement osteotomy, stabilized with an interpositional non vascular iliac bone graft. The posterior open bite was corrected using overlay full coverage crowns. Both these techniques are rarely reported in the literature. The procedure positively improved the quality of life in our patient with regards to her aesthetics, speech and function. This treatment approach could be considered in similar cases to achieve predictable outcomes. DOI: 10.7860/JCDR/2016/16599.7639 | NAT | **JAN TO JUN** | **PMCID: PMC**4866264  **PMID:**27190966 |
|  | Singh M(1), Ponniah M(2), Jacob KS(3).  A nested case-control study to determine the incidence and factors associatedwith unanticipated admissions following day care surgery.  Indian J Anaesth. 2016 Nov;60(11):833-837.  **Author information:**  (1)Department of Neurological Sciences, Neurosciences Critical Care Unit, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Anaesthesia, Christian Medical College, Vellore, Tamil Nadu, India. (3)Department of Psychiatry, Christian Medical College, Vellore, Tamil Nadu, India.  BACKGROUND AND AIMS: Day care surgery offers respite from hospitalisation for specific surgical procedures and has many advantages. However, occasionally patients who undergo such surgery require hospitalisation for unanticipated complications. We aimed to determine their incidence and to identify factors associated with unanticipated admissions in a tertiary care hospital in South India.  METHODS: During the 3-month study, 63 cases requiring admission and 126 randomly selected controls were taken from the 776 procedures that were performed were compared. The variables studied were patients' demographic characteristics, pre-operative medical illness, personal habits, American Society of Anesthesiologists status, the diagnosis and surgical procedures, time since last meal, duration of anaesthesia and surgery, experience of the surgeon and anaesthetist, and intraoperative management (techniques, drugs, monitoring, etc.). Univariate and bivariate statistics were used to determine factors associated with unanticipated admissions.  RESULTS: The incidence of unanticipated admissions following day care surgery was 8.11%. The reasons for admission were anaesthetic (33.33%), surgical (15.87%), medical (6.34%) and social (44.44%). The factors significantly associated with unanticipated admissions included duration of anaesthesia more than 50 min (odds ratio [OR]: 3.179; 95% confidence interval [CI]: 1.503-6.722), and starting the last case after 3 pm (OR: 10.095; 95% CI: 2.418-42.148).  CONCLUSION: Unanticipated admissions following day care surgery occur mainly due to anaesthetic, surgical, medical and social reasons.  DOI: 10.4103/0019-5049.193676 | NAT | **JUL TO DEC** | **PMCID: PMC**5125187  **PMID:**27942057 |
|  | Sonbare DJ(1), Sitaram V(1).  Visible liver metastases.  Natl Med J India. 2016 Mar-Apr;29(2):105.  **Author information:**  (1)Department of HPB Surgery, Christian Medical College, Vellore, Tamil Nadu, India. | NAT | **JAN TO JUN** | **PMID:**27586220 |
|  | Soumya SV(1), Daniel SS(1), Ashish KG(1), Santosh K(1).  Novel Use of Orthosis in a Case of Burn Contracture Microstomia.  J Maxillofac Oral Surg. 2016 Jun;15(2):281-4. doi: 10.1007/s12663-015-0830-1.Epub 2015 Aug 19.  **Author information:**  (1)Christian Medical College & Hospital, Vellore, Tamil Nadu.  AIM: To prevent cicatrical scar formation of the oral commissure post commissuroplasty. METHOD: Bilateral commisuroplasty followed by tooth borne static orthosis and then after dynamic orthosis for a period of one year. CONCLUSION: The use of both static and dynamic orthosis in appropriate sequence resulted in good scar outcome. DOI: 10.1007/s12663-015-0830-1 | NAT | **JAN TO JUN** | **PMCID: PMC**4871835  **PMID:**27298555 |
|  | Stephen S(1), Subashini B(2), Thomas R(3), Philip A(4), Sundaresan R(5).  Skull Base Osteomyelitis Caused by an Elegant Fungus.  J Assoc Physicians India. 2016 Feb;64(2):70-71.  **Author information:**  (1)PG Registrar. (2)Assistant Professor, Dept. of Microbiology, Christian Medical College and Hospital, Vellore, Tamil Nadu. (3)Associate Professor. (4)Assistant Professor. (5)Assistant Professor, Dept. of ENT.  Malignant otitIs externa (skull base osteomyelitis) is predominantly caused by bacteria while fungal etiology is rare. We report a middle aged diabetic gentleman who succumbed to invasive skull base infection due to Apophysomyces elegans a fungus belonging to Zygomycetes which causes only skin and soft tissue infections. Mortality and invasive infections due to this genus is rarely reported, especially in the ear. © Journal of the Association of Physicians of India 2011. | NAT | **JAN TO JUN** | **PMID:**27730788 |
|  | Subramaniam J(1), Eswara S(2), Yesudhason B(3).  Association of Urinary Tract Infection in Married Women Presenting with UrinaryIncontinence in a Hospital based Population.  J Clin Diagn Res. 2016 Mar;10(3):DC10-3. doi: 10.7860/JCDR/2016/16547.7390. Epub2016 Mar 1.  **Author information:**  (1)Associate Professor, Department of Microbiology, Faculty of Medicine, Northern Border University , Northern Borders, Kingdom of Saudi Arabia . (2)Junior Resident, Department of Microbiology, Saveetha Medical College & Hospital, Saveetha Nagar, Thandalam, Kancheepuram District, Chennai, India . (3)Associate Professor, Department of Microbiology, Christian Medical College , Vellore, India.  INTRODUCTION: Urinary incontinence (UI) is increasingly recognized as a significant health problem, which remains a hygienic as well as social problem. Women have higher risk of developing incontinence in their lifetime compared with men. Urinary tract infection can increase the incidence of incontinence. Present study was undertaken to assess the association of UTI in married women who presented with UI. AIM: The present study was aimed to identify the patients (married women) with complaints of UI and determining its association with UTI; and to identify the causative organism for the UTI along with its antimicrobial susceptibility pattern. MATERIALS AND METHODS: This is a cross-sectional, non-randomized study of 107 married women with UI, who attended outpatient department in our hospital. Mid-stream urine (MSU) samples were collected from these patients with positive history of incontinence. Screening of urine for significant bacteriuria and culture to identify the etiological agents were performed followed by evaluation of their antimicrobial susceptibility profiles using Kirby Bauer disc diffusion method. RESULTS: Overall 25.2% of patients with incontinence had a positive urine culture. History of UTI was elicited in around 38.3% of patients, among which 15% had positive urine culture and 10.3% of the patients who did not have a history had positive culture. Escherichia coli was the commonest causative organism (66.6) causing UTI, followed by Enterococcus spp. (22.3%), Klebsiella pneumonia (7.4%) and Proteus mirabilis (3.7%). The antimicrobial susceptibility pattern for Escherichia coli showed high sensitivity to Nitrofurantoin (94.4%) and high resistance to Ampicillin (94.4%). CONCLUSION: Our study revealed one in every four incontinent patients had UTI and almost half of them suffered from previous episodes of UTI. Thus appropriate correction of the existing UTI can help in the treatment of UI. DOI: 10.7860/JCDR/2016/16547.7390 | NAT | **JAN TO JUN** | **PMCID: PMC**4843257  **PMID:**27134871 |
|  | Sudhakar SV(1), Muthusamy K(2), Mani S(3), Gibikote S(3), Shroff M(4).  Imaging in Pediatric Demyelinating and Inflammatory Diseases of Brain- Part 2.  Indian J Pediatr. 2016 Sep;83(9):965-82. doi: 10.1007/s12098-016-2052-z. Epub2016 Apr 30.  **Author information:**  (1)Department of Radiodiagnosis, Christian Medical College and Hospital, Vellore, Tamil Nadu, 632004, India. sniya.sudhakar@gmail.com. (2)Department of Neurology, Christian Medical College and Hospital, Vellore, Tamil Nadu, India. (3)Department of Radiodiagnosis, Christian Medical College and Hospital, Vellore, Tamil Nadu, 632004, India. (4)Department of Pediatric Neuroimaging, Hospital for Sick Children, Toronto, Canada.  Imaging plays an important role in diagnosis, management, prognostication and follow up of pediatric demyelinating and inflammatory diseases of brain and forms an integral part of the diagnostic criteria. This article reviews the spectrum of aquaporinopathies with an in-depth discussion on present criteria and differentiation from other demyelinating diseases with clinical vignettes for illustration; the latter part of article deals with the spectrum of CNS vasculitis.  DOI: 10.1007/s12098-016-2052-z | NAT | **JUL TO DEC** | **PMID:**27130513 |
|  | Sudhakar SV(1), Muthusamy K(2), Mani S(3), Gibikote S(3), Shroff M(4).  Imaging in Pediatric Demyelinating and Inflammatory Diseases of the Brain- Part1.  Indian J Pediatr. 2016 Sep;83(9):952-64. doi: 10.1007/s12098-015-1916-y. Epub2015 Dec 4.  **Author information:**  (1)Department of Radiodiagnosis, Christian Medical College and Hospital, Vellore, Tamil Nadu, 632004, India. sniya.sudhakar@gmail.com. (2)Department of Neurology, Christian Medical College and Hospital, Vellore, Tamil Nadu, India. (3)Department of Radiodiagnosis, Christian Medical College and Hospital, Vellore, Tamil Nadu, 632004, India. (4)Department of Pediatric Neuroimaging, Hospital for Sick Children, Toronto, Canada.  Imaging plays an important role in the diagnosis, management, prognostication and follow up of pediatric demyelinating and inflammatory diseases of the brain and forms an integral part of the diagnostic criteria. Conventional and advanced MR imaging is the first and only reliable imaging modality. This article reviews the typical and atypical imaging features of common and some uncommon demyelinating and inflammatory diseases with emphasis on the criteria for categorization. Imaging protocols and the role of advanced imaging techniques are also covered appropriately.  DOI: 10.1007/s12098-015-1916-y | NAT | **JUL TO DEC** | **PMID:**26634264 |
|  | Sundar G(1), Keshava SN(1), Moses V(1), Chiramel GK(1), Ahmed M(1), Mammen S(1),Aggarwal S(2), Stephen E(2).  Outcomes of catheter-directed treatment of lower extremity deep vein thrombosisof patients presenting to a tertiary care hospital.  Indian J Radiol Imaging. 2016 Jan-Mar;26(1):73-80. doi: 10.4103/0971-3026.178340.  **Author information:**  (1)Department of Radiology, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Vascular Surgery, Christian Medical College, Vellore, Tamil Nadu, India.  BACKGROUND: Lower extremity deep vein thrombosis (DVT) is a common illness with an annual incidence of 1 per 1000 adults. The major long-term complication of DVT is post-thrombotic syndrome (PTS) which occurs in up to 60% of patients within 2 years of an episode of DVT. AIMS: We aim to evaluate the outcomes of catheter-directed treatment (CDT) for symptomatic acute or subacute lower extremity DVT. MATERIALS AND METHODS: A retrospective 12-year study was conducted on the outcomes of CDT on 54 consecutive patients who presented with acute or subacute lower extremity DVT to our hospital. STATISTICAL ANALYSIS: Descriptive summary statistics and the Chi-square test were used to measure the outcomes of CDT. RESULTS: Grade 3 thrombolysis was achieved in 25 (46.3%) patients, grade 2 thrombolysis in 25 (46.3%) patients, and grade 1 thrombolysis in 4 (7.4%) patients. Significant recanalization (grade 2 or 3 thrombolysis) was possible in 50 (92.6%) patients. There was no statistically significant difference in the percentage of significant recanalization that could be achieved between patients who underwent CDT before and after 10 days. There was no significant difference between the thrombolysis achieved between urokinase and r-tPA. PTS was seen in 33% of the patients. Major complications were seen in 5.5% of the patients. CONCLUSION: CDT is a safe and effective therapeutic technique in patients with acute and subacute lower extremity DVT, if appropriate patient selection is made. DOI: 10.4103/0971-3026.178340 | NAT | **JAN TO JUN** | **PMCID: PMC**4813079  **PMID:**27081228 |
|  | Sundaram SC(1), Salins SR(2), Kumar AN(3), Korula G(4).  Intra-Operative Fluid Management in Adult Neurosurgical Patients UndergoingIntracranial Tumour Surgery: Randomised Control Trial Comparing Pulse PressureVariance (PPV) and Central Venous Pressure (CVP).  J Clin Diagn Res. 2016 May;10(5):UC01-5. doi: 10.7860/JCDR/2016/18377.7850. Epub2016 May 1.  **Author information:**  (1)Registrar, Department of Anaesthesia, Christian Medical College , Vellore, India . (2)Assistant Professor, Department of Anaesthesia, Christian Medical College , Vellore, India . (3)Consultant Anaesthetist, Department of Anaesthesia, Kovai Medical Center And Hospital , Coimbatore, India . (4)Professor Emeritus, Department of Anaesthesia, Christian Medical College , Vellore, India .  INTRODUCTION: Fluid management in neurosurgery presents specific challenges to the anaesthesiologist. Dynamic para-meters like Pulse Pressure Variation (PPV) have been used successfully to guide fluid management. AIM: To compare PPV against Central Venous Pressure (CVP) in neurosurgical patients to assess hemodynamic stability and perfusion status. MATERIALS AND METHODS: This was a single centre prospective randomised control trial at a tertiary care centre. A total of 60 patients undergoing intracranial tumour excision in supine and lateral positions were randomised to two groups (Group 1, CVP n=30), (Group 2, PPV n=30). Intra-operative fluid management was titrated to maintain baseline CVP in Group 1(5-10cm of water) and in Group 2 fluids were given to maintain PPV less than 13%. Acid base status, vital signs and blood loss were monitored. RESULTS: Although intra-operative hypotension and acid base changes were comparable between the groups, the patients in the CVP group had more episodes of hypotension requiring fluid boluses in the first 24 hours post surgery. {CVP group median (25, 75) 2400ml (1850, 3110) versus PPV group 2100ml (1350, 2200) p=0.03} The patients in the PPV group received more fluids than the CVP group which was clinically significant. {2250 ml (1500, 3000) versus 1500ml (1200, 2000) median (25, 75) (p=0.002)}. The blood loss was not significantly different between the groups The median blood loss in the CVP group was 600ml and in the PPV group was 850 ml; p value 0.09. CONCLUSION: PPV can be used as a reliable index to guide fluid management in neurosurgical patients undergoing tumour excision surgery in supine and lateral positions and can effectively augment CVP as a guide to fluid management. Patients in PPV group had better hemodynamic stability and less post operative fluid requirement. DOI: 10.7860/JCDR/2016/18377.7850 | NAT | **JAN TO JUN** | **PMCID: PMC**4948505  **PMID:**27437329 |
|  | Surekha V(1), Thomas TA(1), Zechariah RD(1).  Development of a geriatric distance education curriculum for medicalpractitioners.  J Assoc Physicians India. 2016 Jan;64(1):73.  **Author information:**  (1)Christian Medical College, Vellore. | NAT | **JAN TO JUN** | **PMID:**27727955 |
|  | Surya P(1), Keshava SN(1), Irodi A(1), Vyas S(2), Thangakunam B(2).  Recurrent hemoptysis: An unusual cause and novel management.  Indian J Radiol Imaging. 2016 Apr-Jun;26(2):267-70. doi:10.4103/0971-3026.184412.  **Author information:**  (1)Department of Radiology, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Pulmonary Medicine, Christian Medical College, Vellore, Tamil Nadu, India.  We report a rare case a 15 year old boy who presented with recurrent hemoptysis. There was past history of pancreatitis. A CT scan of thorax revealed a small collection in the region of the tail of the pancreas and a tract from it extending across the diaphragm into the posterobasal segment of left lower lobe, suggesting a pancreatico-pleuro-pulmonary fistula. The fistula was embolised by percutaneous injection of glue into the collection and fistula, which resulted in good symptom control. DOI: 10.4103/0971-3026.184412 | NAT | **JAN TO JUN** | **PMCID: PMC**4931790  **PMID:**27413278 |
|  | Telugu RB(1), Chowhan AK(2), Rukmangadha N(2), Patnayak R(2), Phaneendra BV(3),Prasad BC(4), Reddy MK(3).  Histopathological and Immunohistochemical Evaluation of Meningiomas withReference to Proliferative Markers p53 and Ki-67.  J Clin Diagn Res. 2016 Jan;10(1):EC15-9. doi: 10.7860/JCDR/2016/15661.7117. Epub2016 Jan 1.  **Author information:**  (1)Assistant Professor, Department of Pathology, Christian Medical College Hospital , Vellore, Tamilnadu, India . (2)Associate Professor, Department of Pathology, SVIMS , Tirupati, Andhra Pradesh, India . (3)Professor, Department of Pathology, SVIMS , Tirupati, Andhra Pradesh, India . (4)Professor, Department of Neurosurgery, SVIMS , Tirupati, Andhra Pradesh, India .  INTRODUCTION: Meningiomas are slow growing primary central nervous system (CNS) tumours attached to the duramater, which arise from the meningothelial cells of the arachnoid. Grading of meningioma based on histological findings assisted with supplementary immunohistochemical studies, predicts the prognosis of meningioma with good precision.  AIM: To evaluate proliferative markers and correlate with various histological subtypes and grade.  MATERIALS AND METHODS: A total of 224 meningiomas, diagnosed between January1995 and October 2011were graded according to WHO 2007 criteria. Immunostaining for p53 and Ki-67 markers were performed on 100 cases.  RESULTS: There was female predominance. There were 194 Grade I, 24 Grade II and 6 Grade III meningiomas. Brain invasion noted in 18(8%) meningiomas predominantly in grade III followed by grade II. Recurrence was seen in 7 (3.1%) cases, most common in psammomatous followed by angiomatous meningioma. Immunostaining showed p53 positivity in 72.5% of grade I, 83.3% of grade II and all the cases of grade III tumours. Ki-67 Labelling Index (LI) consistently increased from grade I to grade III tumours.  CONCLUSION: p53 and Ki-67 LI correlated well with increasing histological grade and biological behaviour of meningioma.  DOI: 10.7860/JCDR/2016/15661.7117 | NAT | **JAN TO JUN** | **PMCID: PMC**4740600  **PMID:**26894073 |
|  | Telugu RB(1), Chowhan AK(2), Rukmangadha N(2), Patnayak R(2), Phaneendra BV(2),Prasad BC(3), Reddy MK(2).  Human epidermal growth factor receptor 2/neu protein expression in meningiomas:An immunohistochemical study.  J Neurosci Rural Pract. 2016 Oct-Dec;7(4):526-531.  **Author information:**  (1)Department of Pathology, Christian Medical College Hospital, Vellore, Tamil Nadu, India. (2)Department of Pathology, Sri Venkateswara Institute of Medical Sciences, Tirupati, Andhra Pradesh, India. (3)Department of Neurosurgery, Sri Venkateswara Institute of Medical Sciences, Tirupati, Andhra Pradesh, India.  BACKGROUND: Meningiomas are common slow-growing primary central nervous system tumors that arise from the meningothelial cells of the arachnoid and spinal cord. Human epidermal growth factor receptor 2 (HER2) or HER2/neu (also known as c-erbB2) is a 185-kD transmembrane glycoprotein with tyrosine kinase activity expressed in meningiomas and various other tumors. It can be used in targeted therapy for HER2/neu positive meningiomas.  AIM: To correlate the expression of HER2/neu protein in meningiomas with gender, location, histological subtypes, and grade.  MATERIALS AND METHODS: It was 3½ years prospective (March 2010-October 2011) and retrospective (May 2008-February 2010) study of histopathologically diagnosed intracranial and intraspinal meningiomas. Clinical details of all the cases were noted from the computerized hospital information system. Immunohistochemistry for HER2/neu protein was performed along with scoring. Statistical analysis was done using Chi-square test to look for any association of HER2/neu with gender, location, grade, and various histological subtypes of meningiomas at 5% level of significance.  RESULTS: A total of 100 cases of meningiomas were found during the study period. Of which, 80 were Grade I, 18 were Grade II, and 2 were Grade III meningiomas as per the World Health Organization 2007 criteria. The female-male ratio was 1.9:1 and the mean age was 47.8 years. HER2/neu protein was expressed in 75% of Grade I and 72.2% of Grade II and none of Grade III meningiomas. About 72.7% brain invasive meningiomas showed HER2/neu immunopositivity.  CONCLUSION: HER2/neu protein was expressed in 73% of meningiomas. Statistically significant difference of HER2/neu expression was not seen between females and males of Grade I and Grade II/III meningiomas, intracranial and spinal tumors, Grade I and Grade II/III cases, and various histological subtypes of meningiomas.  DOI: 10.4103/0976-3147.188640 | NAT | **JUL TO DEC** | **PMCID: PMC**5006463  **PMID:**27695231 |
|  | Telugu RB(1), Job AJ(2), Manipadam MT(3).  Papillary Cystadenocarcinoma of the Parotid Gland: A Rare Case Report.  J Clin Diagn Res. 2016 Jun;10(6):ED01-3. doi: 10.7860/JCDR/2016/17750.7907. Epub2016 Jun 1.  **Author information:**  (1)Assistant Professor, Department of General Pathology, Christian Medical College , Vellore, Tamilnadu, India . (2)Consultant, Department of ENT, Scudder Memorial Hospital , Ranipet, Vellore, Tamilnadu, India . (3)Professor, Department of General Pathology, Christian Medical College , Vellore, Tamilnadu, India .  Papillary cystadenocarcinoma is a rare malignant neoplasm of the salivary gland, characterized by noticeable cystic and solid areas with papillary endophytic projections. These tumours lack features that characterize cystic variants of several more common salivary gland carcinomas. It was first described in 1991 by World Health Organization as a separate entity and cystadenocarcinoma with or without papillary component in the AFIP classification. Most of these tumours occurred in the major salivary glands followed by minor salivary glands. Cystadenocarcinoma is the malignant counterpart of cystadenoma. We report a case of papillary cystadenocarcinoma of parotid. A 40-year-old lady presented with gradually progressive swelling below the right ear associated with occasional pain. Clinical and radiological features suggested benign neoplasm. Right lobe superficial parotidectomy was performed. The histopathologic diagnosis showed papillary cystadenocarinoma of the parotid gland. Histologic confirmation of stromal invasion is required to differentiate it from the benign lesion. Conservative wide local surgical excision is the treatment of choice.  DOI: 10.7860/JCDR/2016/17750.7907 | NAT | **JAN TO JUN** | **PMCID: PMC**4963657  **PMID:**27504297 |
|  | Telugu RB(1), Pushparaj M(2), Masih D(3), Pulimood A(4).  Synchronous Appearance of Adenocarcinoma and Gastrointestinal Stromal Tumour(GIST) of the Stomach: A Case Report.  J Clin Diagn Res. 2016 Feb;10(2):ED16-8. doi: 10.7860/JCDR/2016/17636.7289. Epub2016 Feb 1.  **Author information:**  (1)Assistant Professor, Department of General Pathology, Christian Medical College , Vellore, Tamilnadu, India . (2)PG Registrar, Department of General Pathology, Christian Medical College , Vellore, Tamilnadu, India . (3)Associate Professor, Department of General Pathology, Christian Medical College , Vellore, Tamilnadu, India . (4)Professor, Department of General Pathology, Christian Medical College , Vellore, Tamilnadu, India .  Adenocarcinoma is the most common histological type of gastric tumour, accounting for approximately 95% of all gastric carcinomas. Gastrointestinal stromal tumours (GISTs) are rare mesenchymal neoplasms of the digestive tract. Synchronous adenocarcinoma and gastrointestinal stromal tumour (GIST) occurring in the stomach is rare and very few cases have been reported in literature. Synchronous tumours in the stomach are rarely diagnosed preoperatively. A 63-year-old gentleman was diagnosed with a gastric adenocarcinoma on endoscopic biopsy and underwent surgery. Postoperative histopathologic examination revealed 2 synchronous tumours with both adenocarcinoma and GIST. The adenocarcinoma was determined to be the aggressive tumour based on histologic features. GIST was categorized as a very low risk of malignancy, based on its size and mitosis. The patient underwent chemotherapy for adenocarcinoma. He is under follow up and is currently disease free. Careful histopathologic evaluation is required to detect co-existing rare synchronous tumours. Presence of the second tumour may require additional procedures or protocols.  DOI: 10.7860/JCDR/2016/17636.7289 | NAT | **JAN TO JUN** | **PMCID: PMC**4800542  **PMID:**27042477 |
|  | Thomas N(1), Bygbjerg IB(2).  Does being born low birth weight affect the ability to exercise?  Indian J Endocrinol Metab. 2016 Nov-Dec;20(6):741-743.  **Author information:**  (1)Department of Endocrinology, Diabetes and Metabolism, Unit-1, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of International Health, University of Copenhagen, Copenhagen, Denmark.  DOI: 10.4103/2230-8210.192920 | NAT | **JUL TO DEC** | **PMID:**27867871 |
|  | Turaka VP(1), Varghese GM(1).  Risk Factors for development of active tuberculosis(TB) in HIV infectedindividuals.  J Assoc Physicians India. 2016 Jan;64(1):112.  **Author information:**  (1)Christian Medical College and Hospital, Vellore. | NAT | **JAN TO JUN** | **PMID:**27728354 |
|  | Turel MK, D'Souza WP, Chacko AG, Rajshekhar V(1).  Giant vestibular schwannomas: Surgical nuances influencing outcome in 179patients.  Neurol India. 2016 May-Jun;64(3):478-84. doi: 10.4103/0028-3886.181558.  **Author information:**  (1)Department of Neurological Sciences, Christian Medical College, Vellore, Tamil Nadu, India.  INTRODUCTION: Giant vestibular schwannomas (VSs; ≥4 cm in size) are considered a separate entity owing to their surgical difficulty and increased morbidity. We studied the clinical presentation and surgical outcomes in a large series of giant VS patients. We also present the surgical nuances, which we believe can improve surgical outcomes.  MATERIALS AND METHODS: The clinical profiles, radiology, surgical results, and complications of 179 consecutive patients with a unilateral giant VS were reviewed. The study population was classified into two groups: Group A (4-4.9 cm, 124 [69.3%] patients) and Group B (≥5 cm, 55 [30.7%] patients).  RESULTS: The mean tumor size in Group A was 4.3 ± 0.2 cm (range, 4-4.8 cm), and in Group B, it was 5.3 ± 0.4 (range, 5-6.7 cm). Patients in Group B were younger, with a mean age at presentation of 34.8 ± 12.3 years versus 41.8 ± 13.1 years in Group A (P < 0.05). There was no difference in the clinical presentation except for papilledema (81.8% vs. 66.9%) and VI cranial nerve (CN) dysfunction (9.1% vs. 2.4%; P< 0.05), which was higher in Group B. There was no difference in the rate of total excision (86.2% vs. 85.4%), anatomical and physiological facial nerve preservation rates between the two groups (approximately 2/3 and 1/3, respectively), and the facial function at discharge. The incidence of postoperative morbidity was not statistically different between the two groups, except for the occurrence of postoperative cerebrospinal fluid (CSF) rhinorrhea, which was greater in Group B (10.9% vs. 2.4%). There were two mortalities in each group (overall, 4/179; 2.2%; P= 0.58).  CONCLUSIONS: Patients with ≥5cm VSs were younger, with a higher incidence of papilledema and lateral rectus paresis. However, when compared with tumors ≥4 cm in size, there was no difference in the extent of excision, facial nerve preservation, and postoperative complications (except CSF rhinorrhea) or mortality. Thus, further subclassification of giant VSs does not seem to be necessary.  DOI: 10.4103/0028-3886.181558 | NAT | **JAN TO JUN** | **PMID:**27147157 |
|  | Udiya AK(1), Shetty GS(2), Chauhan U(3), Singhal S(4), Prabhu SM(5).  Multiple Isolated Enteric Duplication Cysts in an Infant - A Diagnostic Dilemma.  J Clin Diagn Res. 2016 Jan;10(1):TD15-6. doi: 10.7860/JCDR/2016/15129.7129. Epub2016 Jan 1.  **Author information:**  (1)Senior Resident, Department of Radiodiagnosis, Institute of Liver and Bilary Sciences , New Delhi, India . (2)Senior Resident, Department of Radiodiagnosis, All India Institute of Medical Sciences , New Delhi, India . (3)Senior Resident, Department of Radiodiagnosis, GB Pant Hospital , New Delhi, India . (4)Senior Resident, Department of Radiodiagnosis, Lady Hardinge Medical College and assoc. SSK and KSC hospitals , Connaught Place, New Delhi, India . (5)Senior Resident, Department of Radiodiagnosis, CMC , Vellore, India .  Completely isolated enteric duplication cysts are a rare variety of enteric duplication cysts having an independent blood supply with no communication with any part of the adjacent bowel segment. We report a case showing two completely isolated enteric duplication cysts originating in the greater omentum and transverse mesocolon in an infant. Multiple isolated enteric duplication cysts involving non-contiguous bowel segments have not been previously reported in the literature. In addition the transverse mesocolon duplication cyst was infected showing septations and loss of double wall sign resulting in difficulty in imaging diagnosis. Both the cysts were excised and confirmed on histopathology.  DOI: 10.7860/JCDR/2016/15129.7129 | NAT | **JAN TO JUN** | **PMCID: PMC**4740677  **PMID:**26894149 |
|  | Varghese GM(1), Raj D(1), Francis MR(2), Sarkar R(2), Trowbridge P(3), MuliyilJ(4).  Epidemiology & risk factors of scrub typhus in south India.  Indian J Med Res. 2016 Jul;144(1):76-81. doi: 10.4103/0971-5916.193292.  **Author information:**  (1)Department of Medicine 1 & Infectious Diseases, Christian Medical College & Hospital, Vellore, India. (2)Department of Gastrointestinal Sciences, Christian Medical College & Hospital, Vellore, India. (3)Department of Geographic Medicine & Infectious Diseases, Tufts Medical Center, Boston, USA. (4)Department of Community Health, Christian Medical College & Hospital, Vellore, India.  BACKGROUND & OBJECTIVES: Scrub typhus is a major public health threat in South and Southeastern Asian countries including India. Understanding local patterns of disease and factors that place individuals at risk is pivotal to future preventive measures against scrub typhus. The primary aim of this study was to identify specific epidemiological and geographical factors associated with an increased risk of developing scrub typhus in this region.  METHODS: We mapped 709 patients from Tamil Nadu, Andhra Pradesh and Telangana who were admitted to the Christian Medical College (CMC) Hospital, Vellore, Tamil Nadu, India, for the period 2006-2011, assessed seasonality using monthly counts of scrub typhus cases, and conducted a case-control study among a subset of patients residing in Vellore.  RESULTS: The geographic distribution of cases at CMC Hospital clusters around the Tamil Nadu-Andhra Pradesh border. However, distinct hotspots clearly exist distal to this area, near Madurai and the coast in Tamil Nadu, and in the Northeast of Andhra Pradesh. Seasonally, the highest numbers of cases were observed in the cooler months of the year, i.e. September to January. In the case-control analysis, cases were more likely to be agricultural laborers (OR 1.79, 95% CI 1.01 - 3.15), not wear a shirt at home (OR 4.23, 95% CI 1.12 - 16.3), live in houses adjacent to bushes or shrubs (OR 1.95, 95% CI 1.08 - 3.53), and live in a single room home (OR 1.75, 95% CI 1.02 - 3.01). On binary logistic regression, the first three of these variables were statistically significant.  INTERPRETATION & CONCLUSIONS: With the growing number of cases detected in India, scrub typhus is fast emerging as a public health threat and further research to protect the population from this deadly infection is essential. Health education campaigns focusing on the agricultural workers of Southern India, especially during the cooler months of the year, can serve as an important public health measure to control infection.  DOI: 10.4103/0971-5916.193292 | NAT | **JUL TO DEC** | **PMCID: PMC**5116902  **PMID:**27834329 |
|  | Varghese MJ(1), Lahiri A(2), Kumar V(3), Manuel DA(3), George OK(4).  Unraveling the Mystery Behind A Patient with 'Refractory Seizures'.  J Clin Diagn Res. 2016 Feb;10(2):OD01-2. doi: 10.7860/JCDR/2016/15308.7174. Epub2016 Feb 1.  **Author information:**  (1)Associate Professor, Department of Cardiology, Christian Medical College , Vellore, Tamil Nadu, India . (2)Registrar, Department of Cardiology, Christian Medical College , Vellore, Tamil Nadu, India . (3)Assistant Professor, Department of Cardiology, Christian Medical College , Vellore, Tamil Nadu, India . (4)Professor, Department of Cardiology, Christian Medical College , Vellore, Tamil Nadu, India .  Neurological manifestations such as seizures although rare are well recognized presentations of cardiac arrhythmias. Almost always, such events are primarily generalized in nature leading on to loss of consciousness. Rarely however, cardiac seizures can manifest with focal neurological events. We report a case of a sexagenarian who presented with recurrent focal seizures with secondary generalization, who was misdiagnosed and treated as seizure disorder; only a careful history and focussed investigations helped in realising a precise diagnosis.  DOI: 10.7860/JCDR/2016/15308.7174 | NAT | **JAN TO JUN** | **PMCID: PMC**4800567  **PMID:**27042501 |
|  | Vedantam A, Rajshekhar V(1).  Diffusion kurtosis imaging for cerebral astrocytomas.  Neurol India. 2016 Mar-Apr;64(2):273-4. doi: 10.4103/0028-3886.177601.  **Author information:**  (1)Department of Neurological Sciences, Christian Medical College, Vellore, Tamil Nadu, India.  DOI: 10.4103/0028-3886.177601 | NAT | **JAN TO JUN** | **PMID:**26954805 |
|  | Veeraraghavan B(1), Anandan S(2), Sethuvel DP(3), Ragupathi NK(4).  Pefloxacin as a Surrogate Marker for Fluoroquinolone Susceptibility forSalmonella typhi: Problems and Prospects.  J Clin Diagn Res. 2016 Aug;10(8):DL01-2. doi: 10.7860/JCDR/2016/17022.8306. Epub2016 Aug 1.  **Author information:**  (1)Professor and Head, Department of Clinical Microbiology, Christian Medical College , Vellore, Tamil Nadu, India . (2)Associate Professor, Department of Clinical Microbiology, Christian Medical College , Vellore, Tamil Nadu, India . (3)Research Associate, Department of Clinical Microbiology, Christian Medical College , Vellore, Tamil Nadu, India . (4)Senior Research Officer, Department of Clinical Microbiology, Christian Medical College , Vellore, Tamil Nadu, India .  DOI: 10.7860/JCDR/2016/17022.8306 | NAT | **JUL TO DEC** | **PMCID: PMC**5028453  **PMID:**27656439 |
|  | Veeraraghavan B(1), Shankar C(1), Vijayakumar S(1).  Can minocycline be a carbapenem sparing antibiotic? Current evidence.  Indian J Med Microbiol. 2016 Oct-Dec;34(4):513-515. doi:10.4103/0255-0857.195380.  **Author information:**  (1)Department of Clinical Microbiology, Christian Medical College, Vellore, Tamil Nadu, India.  With the increasing incidence of multidrug-resistant organisms, there is a need for newer antibiotics. However, due to the lack of new antimicrobial agents, it is necessary to re-evaluate the older agents like minocycline which is a second-line antimicrobial agent. In this study, minocycline susceptibility testing was performed for 693 Escherichia coli, 316 Klebsiella spp. and 89 Acinetobacter spp. Among extended spectrum beta-lactamase producing E. coli and Klebsiella spp. percentage susceptibility to minocycline were 76 and 85, respectively. Among the carbapenem resistant E. coli, Klebsiella spp. And Acinetobacter spp. minocycline susceptibility were 52%, 55% and 42%, respectively. Based on the susceptibility profile, minocycline can be considered for treatment of infections by multidrug-resistant organisms.  DOI: 10.4103/0255-0857.195380 | NAT | **JUL TO DEC** | **PMID:**27934833 |
|  | Venkatramani V(1), George AJ(1), Chandrasingh J(1), Panda A(1), Devasia A(1).  Urethral duplication with unusual cause of bladder outlet obstruction.  Indian J Urol. 2016 Apr-Jun;32(2):156-8. doi: 10.4103/0970-1591.174780.  **Author information:**  (1)Department of Urology, Christian Medical College, Vellore, Tamil Nadu, India.  A 12-year-old boy presented with poor flow and recurrent urinary tract infections following hypospadias repair at the age of 3 years. The evaluation revealed urethral duplication with a hypoplastic dorsal urethra and patent ventral urethra. He also had duplication of the bladder neck, and on voiding cystourethrogram the ventral bladder neck appeared hypoplastic and compressed by the dorsal bladder neck during voiding. The possibility of functional obstruction of the ventral urethra by the occluded dorsal urethra was suspected, and he underwent a successful urethro-urethrostomy. DOI: 10.4103/0970-1591.174780 | NAT | **JAN TO JUN** | **PMCID: PMC**4831507  **PMID:**27127361 |
|  | Verghese A(1).  The integration of psychiatry and neurology.  Indian J Psychiatry. 2016 Jan-Mar;58(1):104-5. doi: 10.4103/0019-5545.174405.  **Author information:**  (1)Department of Psychiatry, Christian Medical College, Vellore, Tamil Nadu, India. E-mail: averghese2002@yahoo.co.in.  DOI: 10.4103/0019-5545.174405 | NAT | **JAN TO JUN** | **PMCID: PMC**4776572  **PMID:**26985119 |
|  | Vinotha T(1), Anitha T(1), Ajit S(1), Rachel C(1), Abraham P(1).  The Role of Completion Surgery in Ovarian Cancer.  J Obstet Gynaecol India. 2016 Oct;66(Suppl 1):435-40. doi:10.1007/s13224-015-0796-4. Epub 2015 Nov 4.  **Author information:**  (1)Department of Gynaec Oncology, Christian Medical College and Hospital, Vellore, Tamil Nadu 632004 India.  INTRODUCTION: Patients referred with inadequately staged ovarian malignancies present a clinical dilemma. We report our experience with completion surgery in ovarian cancer.  AIMS AND OBJECTIVES: To determine the benefits and risks of completion surgery in women with ovarian cancer who presented after having had inadequate primary surgery.  METHODS: A retrospective case series of 30 women with ovarian cancer and one with fallopian tube cancer who had inadequate primary surgery underwent completion surgery at gynaecologic oncology unit in a tertiary level hospital in Tamil Nadu, India. Electronic medical records of patients with ovarian cancer who underwent completion surgery between January 2011 and September 2014 for ovarian were reviewed. Forty-five patients with initial inadequate surgery were identified of whom 31 underwent completion surgery; the remaining 14 did not return to our hospital.  RESULTS: Thirty-one women with a mean age of 37 years (17-53) and median parity of 2 (0-4) with inadequately staged ovarian malignancy underwent completion surgery. Complex ovarian mass was the most common indication for initial surgery (94 %). The tumours were epithelial in 27 (87 %), germ cell in 3 (10 %) and sex cord stromal in 1 (3 %). In view of extensive disease at presentation, 19 % (6/31) were referred for neoadjuvant chemotherapy and underwent interval debulking. With regard to surgical complexity, 52 % (16/31), 38 % (12/31) and 10 % (3/31) underwent simple, intermediate and complex surgeries, respectively. Optimal cytoreduction (R0 and R1) was performed in 25 patients (81 %). Twelve (39 %) had upstaging of disease. Six patients required no further adjuvant treatment following surgical restaging. Complications included bladder injury (1), iliac vessel injury (1) and surgical site infections (2). During the study period of 45 months, 7 patients (23 %) presented with disease recurrence. There were 2 recorded deaths.  CONCLUSIONS: In inadequately staged ovarian malignancies, completion surgery should be considered based on the patients' performance status and disease assessment. Considering the low specificity of imaging and Ca 125, completion surgery provides information to plan adjuvant therapy, besides allowing optimal cytoreduction but delays initiation of adjuvant therapy.  DOI: 10.1007/s13224-015-0796-4 | NAT | **JUL TO DEC** | **PMCID: PMC**5016422  **PMID:**27651643 |
|  | Yoganathan S(1), Sudhakar SV(2), Thomas MM(1), Yadav VK(2).  A tropical menace of co-infection of Japanese encephalitis and neurocysticercosisin two children.  J Pediatr Neurosci. 2016 Apr-Jun;11(2):140-4. doi: 10.4103/1817-1745.187644.  **Author information:**  (1)Department of Neurological Sciences, Christian Medical College, Vellore, Tamil Nadu, India. (2)Department of Radiodiagnosis, Christian Medical College, Vellore, Tamil Nadu, India.  Japanese encephalitis (JE) is a mosquito borne encephalitis caused by Flavivirus.Neurocysticercosis (NCC) is a parasitic disease of the central nervous systemcaused by Taenia solium. In this report, we describe the clinical profile,imaging findings, and outcome of two children with JE and coexisting NCC. Elevenand thirteen-year-old boys from the same town of Jharkhand state were broughtwith history of fever, seizures, altered sensorium, and extrapyramidal symptoms.Dystonia, hypomimia, bradykinesia, and dyskinesia were observed. Meige syndromeobserved in one of the children is a novel finding. Magnetic resonance imaging ofthe brain revealed findings suggestive of JE with cysticercal granulomas. Thereare few reports of coexistence of JE and NCC in children. Both children weretreated with ribavirin, and follow-up imaging had shown significant resolution ofsignal changes. Both the children had shown marked clinical improvement.Ribavirin was found to beneficial in reducing the morbidity in our patients. DOI: 10.4103/1817-1745.187644 | NAT | **JAN TO JUN** | **PMCID: PMC**4991158  **PMID:**27606026 |

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| **MONTH & YEAR** | **INTERNATIONAL** | **NATIONAL** | **TOTAL** |
| **JANUARY - JUNE 2016** | **149** | **97** | **-** |
| **JULY – DECEMBER 2016** | **198** | **97** | **-** |
| **TOTAL =** | **347** | **194** | **541** |