



MEDICINE INFORMATION NEWSLETTER

VOLUME 4 ISSUE 3

Jul-Sep 2018

IN THIS ISSUE

Editors' Desk	1	Website of Interest	3
Quote	1	Health Days	3
Courses	2	News	4
Focus	2	Resources	4
Conferences	2	Opportunities	4
Alerts	3	Gallery	5
Did You Know?	3		

Editors' Desk

The Government of India, under the Ayushman Bharat Scheme, has launched two ambitious and transformational programmes this year: National Health Protection Scheme (NHPS); and Setting up of Health and Wellness Centres (HWCs). NHPS aims at providing health insurance coverage worth Rs 5 lakh per year for 10 crore vulnerable families covering almost 50 crore individuals. The Government has announced the capping of price of various procedures and in the process of en-panelling hospitals. There are two basic concerns: When all people have now access to cashless treatment in private and public secondary and tertiary hospitals, there is possibility of overcrowding; whether the real vulnerable persons have enough resources to reach these hospitals. It is also required to take initiative to increase the number of beds and the number of health facilities. The second programme aims at setting up of 1.5 lakh HWCs closer to the people which means to strengthen the primary care levels. In addition, the government proposes to provide limited prescribing power to non-medical health workforce which aims at addressing the issue of shortage of medical doctors. We welcome these initiatives as they are meant for achieving universal health coverage.

Access to quality essential medicines is a part of achieving universal health coverage. The Government of India has made serious attempts for promoting generic medicines as means of making the quality medicines affordable. The recent advisory note of Drugs Controller General (India) to keep a shelf for generic medicines in every medical store or pharmacy is another move in this direction. There are many issues related to generic medicines including their maximum retail prices. The Jan Ayushadhi programme need professional management to ensure that all stores are functional and without stock outs. Price control is another way of making medicines affordable. We find some aberrations in it. The lower strength products are more expensive than the higher strength one of the same company. Just to cite one: One brand of Amoxicillin and Potassium Clavulanate tablets - MRP of 10 tablets of 375 mg strength is Rs 229.00 and that of 625 mg strength is Rs 176.78. Government needs to look into such aberration in price.

The current issue has all our regular features and hope you would find them interesting to read. We shall be glad to have your feedback to improve the quality and contents of the newsletter.

Department of Pharmacy, Annamalai University, has been ranked at 20th position in NIRF -2018 among the Pharmacy institutions in the country and 2nd among the institutions of Tamil Nadu. Ministry of Human Resource Development, Government of India, through National Institutional Ranking Framework (NIRF), has been ranking institutions across the country since 2016.

Editorial Board

Chief Editor:

Dr. Prabal Kumar Manna

Executive Editor:

Dr. Guru Prasad Mohanta

Production Executives:

Dr. S. Selvamuthukumar

Dr. S. Parimalakrishnan

Team Members:

Dr. C. K. Dhanapal

Dr. S. Madhusudhan

Dr. R. T. Saravanakumar

Dr. G. Gopalakrishnan

Mr. P. Mahendrarvarman

Dr. G. Veeramani

Dr. K. Saravanan

Dr. V. P. Maheshkumar

Contact Us

The Editors,
Medicine Information Newsletter,
Department of Pharmacy,
Annamalai University,
Annamalai Nagar - 608 002,
Tamil Nadu, India.
Email: dicpharmd@gmail.com

Quote

"The single characteristic separating man from the lower animals is his intense desire to take medicines"

– Sir William Osler,
A noted Physician

Courses

Logistics for Health Commodities: Global Health Learning Centre offers a free course on logistics for health commodities. The course aims at providing a wide range of logistics principles and practices as well as highlights each function of the logistics cycle, including assessing stock status, inventory control, and monitoring and evaluation. Further details can be accessed at: <https://www.globalhealthlearning.org/course/logistics-health-commodities>

IDF Online Short Course on Diabetes and Cardiovascular Disease (CVD): International Diabetes Federation (IDF) School of Diabetes is offering an online short course on Diabetes and CVD for healthcare professionals. The course is free and it aims to discuss the link between diabetes and cardiovascular disease, reviews types of CVD complications, its pathophysiology, screening, diagnostics and strategies for managing CVD complications. The

course can be accessed at: <https://www.idfdiabeteschool.org/Shortcourse/ShortCourseDetails?courseID=16>

Online Course on Managing TB: The National Institute for Research in Tuberculosis (NIRT), Chennai, is offering an online course for Doctors on TB, called 'Manage TB'. The free online course is designed to provide basic information about TB and its management. The participants will be provided with an overview of the extent of the TB burden globally and nationally, its pathogenesis, diagnostic modalities, treatment regimens, prevention strategies and efforts towards TB elimination. Guidelines, new TB drugs, vaccines and diagnostics are point of focus. NIRT is a WHO Collaborating Centre for TB Research and Training. More details may be accessed at: https://onlinecourses.nptel.ac.in/noc18_ge10/preview

Conferences

11th Global Health Supply Chain

Summit: The 11th Global Health Supply Chain Summit (GHSCS) will be held over three days, November 28-30, 2018 in Lusaka, Zambia. The summit intends to have the participation of an impressive group of practitioners and experts from the global health supply chain field including academics, country planners, NGOs, logistics practitioners, pharmaceutical industry and donor representatives. Professor Yehuda Bassok may be contacted for more details at: bassok@marshall.usc.edu

Focus: Nipah Virus Infection

The recent outbreak of Nipah virus infection in Kerala has taken several lives. As a precautionary measure, the educational institutes were closed during the period. The travel advisory was issued for people travelling to Kerala advising them to be extra-careful while visiting the affected areas: Kozhikode, Malappuram, Wayanad and Kannur Districts. Here is a fact sheet about Nipah Virus Infection [<http://www.who.int/news-room/fact-sheets/detail/nipah-virus>].

- Nipah virus infection in humans causes a range of clinical presentations, from asymptomatic infection (subclinical) to acute respiratory infection and fatal encephalitis.
- The case fatality rate is estimated at 40% to 75%. This rate can vary by outbreak depending on local capabilities for epidemiological surveillance and clinical management.
- Nipah virus can be transmitted to humans from animals (such as bats or pigs), or contaminated foods and can also be transmitted directly from human-to-human.
- Fruit bats of the Pteropodidae family are the natural host of Nipah virus.
- There is no treatment or vaccine available for either people or animals. The primary treatment for humans is supportive care.

Reducing the risk of infection:

- Reducing the risk of bat-to-human transmission- Efforts to prevent transmission should first focus on decreasing bat access to date palm sap and other fresh food products. Keeping bats away from sap collection sites with protective coverings (such as bamboo sap skirts) may be helpful. Freshly collected date palm juice should be boiled, and fruits should be thoroughly washed and peeled before consumption. Fruits with sign of bat bites should be discarded.
- Reducing the risk of animal-to-human transmission – Gloves and other protective clothing should be worn while handling sick animals or their tissues, and during slaughtering and culling procedures. As much as possible, people should avoid being in contact with infected pigs. In endemic areas, when establishing new pig farms, considerations should be given to presence of fruit bats in the area and in general, pig feed and pig shed should be protected against bats when feasible.
- Reducing the risk of human-to-human transmission- Close unprotected physical contact with Nipah virus-infected people should be avoided. Regular hand washing should be carried out after caring for or visiting sick people.

Health-care workers caring for patients with suspected or confirmed infection, or handling specimens from them, should adhere to standard infection control precautions at all times.

Alerts

Dengue Vaccine -Testing Required before Use of Dengvaxia:

Dengvaxia is the only Dengue vaccine available currently and is developed by a French pharmaceutical company, Sanofi. Recently WHO updated the safety information on this vaccine. It advises that the vaccine should only be used after testing on individuals whether they have ever been exposed to Dengue infection. This vaccine performs differently in seropositive versus seronegative individuals. The WHO advocates the “pre-vaccination screening strategy” in which only dengue seropositive persons are vaccinated. There are reports of increased risks of hospitalization and severe dengue in seronegative individuals starting about 30 months after the first dose. [Source: http://www.who.int/immunization/diseases/dengue/revise_SAGE_recommendations_dengue_vaccines_apr2018/en/]

Clarithromycin may Increase Risk of Death:

The USFDA has warned that use of the commonly prescribed antibiotic Clarithromycin may increase the risk of heart problems or death, years later in patients with heart disease. The antibiotic is in use for treating a variety of mild-to-moderate acute bacterial infections, including acute bacterial exacerbations of chronic bronchitis in adults, community-acquired pneumonia, ear infections in children, maxillary sinusitis, skin infections, tonsillitis and to treat (in combination with other medicines) peptic ulcer caused by *Helicobacter pylori*. This new warning is based on a large randomized clinical trial called the CLARICOR trial. It is preferable to use another antibiotic when antibiotic is needed for heart patients. The patients should also be advised to look at these symptoms while with Clarithromycin therapy: symptoms of a heart attack or stroke, such as chest pain, shortness of breath or trouble breathing,

pain or weakness in one part or side of your body, or slurred speech. They should seek immediate medical attention.

Lamotrigine linked to potentially life-threatening adverse reaction:

The USFDA has recently issued safety alert regarding the use of Lamotrigine and the possibility of Hemophagocytic lymphohistiocytosis (HLH), a rare but serious immune system reaction. HLH may cause severe inflammation which may lead to multi-organ failure resulting in hospitalization and death. A diagnosis of HLH can be made if a patient has ≥ 5 of the following symptoms:

- Fever and rash
- Splenomegaly
- Cytopenias affecting ≥ 2 of 3 lineages in the peripheral blood (haemoglobin $< 90\text{g/L}$ [in infants < 4 weeks: haemoglobin $< 100\text{g/L}$; platelets $< 100 \times 10^9/\text{L}$; neutrophils $< 1.0 \times 10^9/\text{L}$)
- Hypertriglyceridemia (fasting triglycerides $\geq 265\text{mg/dL}$) and/or hypofibrinogenemia ($\leq 1.5\text{g/L}$)
- High levels of blood ferritin ($\geq 500\mu\text{g/L}$)
- Hemophagocytosis identified through bone marrow, spleen, or lymph node biopsy
- Decreased or absent Natural Killer Cell activity
- Elevated blood levels of CD25 showing prolonged immune cell activation ($\geq 2400 \text{ U/mL}$)

Lamotrigine is indicated for the treatment of seizure disorders as well as bipolar I disorder. Patients should be informed on the symptoms associated with HLH and should be advised to seek medical attention immediately if they experience the above symptoms while on lamotrigine therapy.

Important Health Days

July	1	Doctors Day (In India)
	11	World Population Day
	29	ORS Day
August	1-7	World Breast Feeding Week
	25 th Aug – 8 th Sept.	Eye Donation Fortnight
September	1-7	National Nutrition week
	4-11	World Pharmacy Week
	12	World Oral Health Day
	21	World Alzheimer’s Day
	25	World Pharmacists Day
	26	World Day of the Deaf
	28	World Heart Day I World Rabies Day

Did You Know?

Barry J. Marshall – Scientist Drank Bacteria to prove that *Helicobacter pylori* is responsible for gastric ulcer.

The theory of this Australian Scientist ‘*H. pylori* association with ulcer’ was against the conventional wisdom of the time ‘Ulcer in the stomach is caused by the excess acidity in the stomach’. In order to prove his theory of ulceration and generate evidence, Marshall drank the bacteria in July 1984. After a few days, he had a lot of vomiting and endoscopy showed that the bacteria were attacking the lining of his stomach. This discovery “Detection and Eradication of *H. pylori* is the key to treatment of duodenal and gastric ulcer” was finally accepted in 1994 by the National Institute of Health. He was awarded Nobel Prize in Medicine in 2005.

Website of Interest

Knowledge Gateway:

The Knowledge Gateway is an electronic communication platform that connects people working in health and development through virtual networks and online discussions to facilitate knowledge sharing and exchange. This online platform was developed by World Health Organization and the partners in 2004, and is now the most popular electronic platform in the health and development sectors. It is used by over 300,000 health and development professionals in every country of the world. The website can be accessed at: <https://knowledge-gateway.org/>

NEWS

First Artificial Intelligence Device: The USFDA has recently approved a medical device that uses artificial intelligence (AI) which does not require a clinician to interpret the results. For the first time, the AI diagnostic system, IDx-DR, is approved for use in detecting diabetic retinopathy. A doctor needs to upload the digital images of patient's retinas to a cloud server which contains this software. The software after analysis provides one of the two results: (1) "more than mild diabetic retinopathy detected: refer to an eye care professional" or (2) "negative for more than mild diabetic retinopathy; rescreen in 12 months." More than mild diabetic retinopathy indicates referral for further diagnosis and treatment. This would be an useful tool at primary care level.

Thiazides best first choice for hypertension: One of the primary concerns in therapeutics is the choice of drugs when several options are available. The choice has consequences both in terms of health outcomes and cost. Hypertension is known to increase the risk of heart attacks and stroke. The Cochrane Hypertension Group has updated its recommendation on what drug class should be the best first-line choice in treating adult patients with raised blood pressure. The Cochrane Review concluded that most of the evidence demonstrated that first-line low-dose thiazides reduced mortality, stroke, and heart attack. No other drug class improved health outcomes better than low-dose thiazides. Beta-blockers and high-dose thiazides were inferior. High-quality evidence supported that low-dose thiazides should be used first for most patients with elevated blood pressure. Fortunately, thiazides are also very inexpensive. Drug classes studied included thiazide diuretics, beta-blockers, ACE inhibitors, and calcium channel blockers.

Mental Health Care Act 2017 comes into effect: The Mental Health Care Act 2017 has come into effect since 29th May 2018. This new Act intends to empower people with mental illnesses

to access therapy without discrimination. Under the Act the government would set up Central Mental Health Authority at National level and State Mental Health Authority at each state. The mental health institutes and mental health practitioners including clinical psychologists, mental health nurses and psychiatric social workers will have to register with these agencies. The notable features of the new Act are: de-criminalization of attempt to commit suicide, banning the uses of electroconvulsive therapy without muscle relaxant or anaesthesia and making provision for insurance coverage for mental illnesses.

WHO EML 2019 Update: The World Health Organization is in the process of updating its Essential Medicine List. The 22nd WHO Expert Committee on Selection and Use of Essential Medicines will meet in Geneva, Switzerland, from 1 to 5 April 2019 to consider applications seeking inclusion, changes to or removal of medicines on the WHO Model List of Essential Medicines (EML) including Essential Medicines for Children. Information for applicants is available on the WHO EML webpage at:

http://www.who.int/selection_medicines/committees/expert/22/en/

Import of Unapproved Life Savings in Small Quantities for Personal Use is permitted: The Government of India has amended the rules permitting to import the life-saving drugs but not approved in India for personal use. This has come into effect from 1 June 2018. Under the new rule, the patient has to apply to Drugs Controller General (India) and a permit would be issued. A patient can obtain the permit and import the drug "till such time" as one requires as per the prescription of a registered medical practitioner. Earlier it was for just six months. However, the permit holder needs to submit details of drugs imported and utilised to the licensing authority on a yearly basis.

Resources

WHO Guidance on Communicating Risk in Public Health Emergencies: World Health Organization has released the first ever evidence based guideline on Emergency Risk Communication to support countries in building capacity for communicating risk during health emergencies. The guideline can be downloaded from: <http://apps.who.int/iris/bitstream/10665/259807/2/9789241550208-eng.pdf?ua=1>

Pharmacy Times: This is an important publication aims to provide practical information to the pharmacists. The website offers clinical information on several diseases. This free resource can be accessed at: <http://www.pharmacytimes.com/>

Where There Is No Psychiatrist: A Mental Health Care Manual: This 2nd edition is authored by by Vikram Patel and Charlotte Hanlon The Royal College of Psychiatrists. This practical manual of mental health care is vital for community health workers, primary care nurses, social workers and primary care doctors, particularly in low-resource settings. This guide gives the reader a basic understanding of mental illness by describing more than thirty clinical problems associated with mental illness and uses a problem-solving approach to guide the reader through their assessment and management. The book can be downloaded from:

<https://www.cambridge.org/core/books/where-there-is-no-psychiatrist/47578A845CAFC7E23A181749A4190B54#fndtn-contents>

Opportunities

Post –Doctoral Associate at the College of Engineering and School of Public Health, USA: The post-doctoral association position is available at the College of Engineering and School of Public Health, Boston University, USA, for a project focused on social, behavioral, and policy factors contributing to antibiotic resistance in both human and veterinary sectors. More details can be accessed at:

<https://bu.silkroad.com/epostings/index.cfm?fuseaction=app.jobinfo&jobid=301818&source=ONLINE&JobOwner=1016383&company_id=15509&version=1&byBusinessUnit=&bycountry=&bystate=&byRegion=&bylocation=&keywords=&byCat=&proximityCountry=&postalCode=&radiusDistance=&isKilometers=&tosearch=no&city>

The contact person: Juliana Restivo at jrestivo@bu.edu



AICTE - ISTE Induction Programme on Research Methodology: a Group photo of 09.6.2018



Professor Raghu Pratap is felicitated on 30th April 2018 by Professor P.K. Manna, Head of the Department, on the former's superannuation.



Professor Guru Prasad Mohanta with legendary Padma Shri Professor Harkishan Singh on 9th May 2018 at latter's residence



Tissue Culture Laboratory of Department of Pharmacy was declared open by Prof. S. Manian, Vice Chancellor, on 24th May 2018

DISCLAIMER:

The Newsletter intends to provide updated and reliable information on medicines and other related issues in an attempt to equip healthcare professionals to take informed decision in recommending medicines to the patients. However, they are encouraged to validate the contents. None of the people associated with the publication of the Newsletter nor the University shall be responsible for any liability for any damage incurred as a result of use of contents of this publication. The brand names of medicines, if mentioned, are for illustration only and the Newsletter does not endorse them.