



Ministry of Health and Sports

# Present and Previous Conducted Research on School Health

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Online Brainstorming Workshop for Further Development of Action Plan for  
Implementation Research (SH), DMR (POLB), 17<sup>th</sup>-18<sup>th</sup> September 2020



# Area of Research

- **Nutrition**
- **Physical activity and fitness**
- **Non- communicable diseases**
- **Infection**
- **Immunization/EPI**
- **Reproductive Health**
- **Oral Health**
- **Environmental Health**



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# **Present Research by Department of Medical Research**



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# Nutrition

- **Sugar-sweetened beverage consumption patterns and estimated intake of aspartame from their sugary drink consumption among school-aged children in Yangon'. ( IR Grant).**
- **Nutrient profiling of snack foods commonly consumed by primary school children of Yangon(Phase1 study)(WHO 2020-2021)**





# Physical Activity and Fitness

- Longitudinal study of physical growth pattern, vitamin D and iron status of adolescent students attending Institutes of Sports and Physical Education (Mandalay and Taunggyi)





# Non-communicable diseases

- **Prevalence of dyslipidemia and prevalence of non-alcoholic fatty liver disease (NAFLAD) among 10-14 year old over weight and obese school children in selected schools of Yangon Region(DMR Grant)**
- **Assessing knowledge, attitude and practice on health risk behavior and healthy lifestyle among 9th and 10th grade school students, Yangon Region (IR Grant)**





# Infection

- **Molecular verification of Schistosoma infection among stool samples collected from different potentially endemic regions of Myanmar (Patheingyi District)" during 2020-2021 with WHO DFC funding. Study population will be primary school children from Patheingyi District.(WHO2020-2021)**





# Previous conducted Research



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# Nutrition

- **Assessment of dietary intake and nutritional status of children living in fostered monasteries in Yangon Region, Mya Ohnmar; 43rd Myanmar Health Research Congress. Yangon: DMR (LM), 2015. P12.**
- **A study on nutritional status of primary school children (5-10 year) and mother knowledge on nutrition among in Zayarthiri Township (Poster). Wai Phyo; 22nd Myanmar Military Medical Conference. Yangon: DSMRDC, 2015. P44-45.**
- **Dietary diversity and nutritional status among early adolescents at No. (3) Basic Education High School in Pyinmana Township. (MPH Thesis. Yangon: University of Public Health; 2016)**
- **Stunting and zinc nutritional status among primary school children in North-Okkalapa Township, Khin Nyo Thein, 44th Myanmar Health Research Congress. Yangon: DMR; 2016. P26.**





- **Nutritional status of primary school children from four geographical regions of Myanmar in 2015, Moh Moh Hlaing, 44th Myanmar Health Research Congress. Yangon: DMR; 2016. P28.**
- **Diet consumption pattern of primary school children from four geographical regions of Myanmar in 2015, Moh Moh Hlaing, 45th Myanmar Health Research Congress. Yangon: DMR; 2017**
- **Dual burden of malnutrition among primary school children in Myanmar, 2015. Moh Moh Hlaing. Poster presentation at 9<sup>th</sup> ICPH at Greater Mekong Sub-regional Countries, November, 2017 Yangon**
- **Sociodemographic characteristics and life-style factors in relation to nutritional status in school children (M.Med.Sc. Paediatrics University of Medicine (1), 2017)**
- **Serum zinc and selenium level and nutritional status of Primary School Children in North Okkalapa Township ( M.Med.Sc. Paediatrics, University of Medicine (2), 2018)**





- **Fruits and vegetables intake of the students attending the Institute of Sports and Physical Education (Yangon)(Poster)Kaung Myat Thu, 47th Myanmar Health Research Congress. Yangon: DMR; 2019**
- **Dietary intake and nutritional status of the students attending theInstitute of Sports and Physical Education (Yangon)(Poster),Mya Ohnmar, 47th Myanmar Health Research Congress. Yangon: DMR; 2019.**
- **Sugar-sweetened beverages consumption patterns among medical students from Yangon and Magway.Kyae Mhon Htwe. 48th Myanmar Health Research Congress. Yangon: DMR; 2020**
- **From Evidence to Practice: Community led school feeding in primary schools in rural area of Hmawbee township. Moh Moh Hlaing.(Poster) 48<sup>th</sup> Myanmar Health Research Congress,Yangon, 2020.**





# Physical activity and fitness

- **Cardiopulmonary fitness of adolescent students attending Institute of Sports and Physical Education, Yangon (Khin Mi Mi Lay)**
- **Exploring ways to promote body build of adolescents by measuring energy expenditure (Khin Mi Mi Lay)**





## **Non-Communicable diseases**

- **Selective non-communicable diseases risk factors status of female school teachers from Dagon Myothit (North) Township in Yangon, Myanmar, Khin Mittar Moe San, 45th Myanmar Health Research Congress. Yangon: DMR; 2017**
- **Potential risk factors of cardiovascular diseases among adolescent students at two selected schools in Yangon, Sandar Kyi, 45th Myanmar Health Research Congress. Yangon: DMR; 2017.**
- **Factor influencing obesity indices among school teachers from Dagon Myothit (North) Township in Yangon, Myanmar. Khin Mittar Moe San, 46th Myanmar Health Research Congress. Yangon: DMR; 2018. P28.**
- **Associated factors for childhood obesity among primary school children in Taunggyi, Myanmar, Honey Win. 46th Myanmar Health Research Congress. Yangon: DMR; 2018. P28.**





# Infection

- Intestinal worm infestations and nutritional status among Primary School Children(M.Med.Sc. Paediatrics, University of Medicine (2),2015)
- Secoprevalence of helicobacter pylori infection and its determinants among asymptomatic school children(University of Medicine, Mandalay,2015)
- Common intestinal parasitic infestation among the monastery education school children in North Okkalapa Township(M.Med.Sc. Microbiology University of Medicine (2), 2018)
- Egg positivity rate of pinworm among primary school children in three townships of Yangon Regio,Thi Thi Htoon,(Poster). 46th Myanmar Health Research Congress. Yangon: DMR; 2018





- **Knowledge on HIV/AIDS and attitude towards HIV affected and/or infected school children among the school teachers in South Dagon Township in Yangon Region (Poster), Khin Sandar Oo, 47th Myanmar Health Research Congress. Yangon: DMR; 2019**
- **Molecular characterization of Giardia intestinalis from primary school children of selected monastery schools in Yangon (Ph.D. Medical Microbiology. University of Medicine (2), 2019)**
- **Seroprevalence of HBsAg among School Children in Selected Schools of Bago and Mandalay Regions, Aung Thandar Oo, 48th Myanmar Health Research Congress. Yangon: DMR; 2020**







# Immunization/EPI

- **Serological response to second dose of measles vaccine in preschool children(M.Med.Sc. Paediatrics University of Medicine (2), 2015)**
- **Seroprevalence and degree of seroprotection of diphtheria in primary school children in Thar-Kay-Ta Township, Yangon (M.Med.Sc. Microbiology, University of Medicine (2),2018)**







# Oral Health

- Time and sequence of permanent teeth eruption in bamar school children in Sagaing Region(M.D.Sc. Oral Biological Science. University of Dental Medicine (Yangon),2017)
- Comparative study between the effectiveness of two methods in oral health education among grade V school children in Monywa(M.D.Sc. Preventive and Community Dentistry, University of Dental Medicine, 2017)
- Dental fluorosis among 12-14 year old school children in selected areas of Chan Mya Tharsi Township(M.D.Sc. Preventive and Community Dentistry,University of Dental Medicine, 2017)
- ◉ Study on oral health awareness of caregivers and dental caries status among 5-year-old school children in Bokpyin Township (M.D.Sc. Preventive and Community Dentistry,University of Dental Medicine,2019)





- **Study on traumatic injuries to permanent incisors in 12-year-old school children and its awareness among middle school teachers in Pyay Township, Bago Region(M.D.Sc. Preventive and Community Dentistry University of Dental Medicine (Yangon), 2019)**





# Reproductive Health

- Reproductive health communication and behaviour among university students in Yangon Region, Nyein Su Aye. (Poster) 46th Myanmar Health Research Congress. Yangon: DMR; 2018
- Parents' perception on sex education towards their adolescent children in Twantay Township, Yangon Region, Tun Win Latt, 47th Myanmar Health Research Congress. Yangon: DMR; 2019
- Understanding sexual behaviour and patterns of contraceptive use among unmarried adolescent university students in Mandalay District, Myanmar, Myitzu Tin Oung, 47th Myanmar Health Research Congress. Yangon: DMR; 2019





# Environmental Health

- **Determination of the Indoor Radon Concentration in Selected Primary Schools of Four Townships, Yangon Region, Win Thaw Tar Lwin, 48th Myanmar Health Research Congress. Yangon: DMR; 2020**



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## Others

- **Hearing impairment among Primary School Children in North Okkalapa Township.(M.Med.Sc. Otorhinolaryngology. University of Medicine (2),2015)**
- **Study of hearing impairment in primary school children at No.34 Basic Education Primary School, Tamwe Township Yangon Division.( M.Med.Sc., Otorhinolaryngology,University of Medicine (1),2015**
- **Refractive errors among school children between 12 to 16 years of age in San Chaung Township, Yangon.(M.Med.Sc. Ophthalmology, University of Medicine ,2015)**
- **Skin diseases in primary school children of urban and periurban areas(University of Medicine, Mandalay, 2015)**
- **Effect of obesity on pulmonary function of school children( University of Medicine, Mandalay,2015)**





# Category and number of research on school health (2015-2020)

<b>Nutrition</b>	<b>15</b>	<b>Total</b>
<b>Physical activity and fitness</b>	<b>3</b>	
<b>Non-communicable diseases</b>	<b>6</b>	
<b>Infection</b>	<b>8</b>	
<b>Immunization/EPI</b>	<b>2</b>	
<b>Oral Health</b>	<b>5</b>	
<b>Reproductive health</b>	<b>3</b>	
<b>Environmental Health</b>	<b>1</b>	
<b>Others</b>	<b>5</b>	<b>48</b>
<b>- Otorhinolaryngology</b>	<b>2</b>	
<b>-Ophthalmology</b>	<b>1</b>	
<b>-Skin infection</b>	<b>1</b>	
<b>- Pulmonary function</b>	<b>1</b>	



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# Planned Research

- **Nutritional surveillance among primary school children in Myanmar**
- **Sweetened food and drink consumption and dental caries among primary school children in Myanmar**
- **Serological response to hepatitis B vaccination and prevalence of hepatitis A and C infection among primary school children in Myanmar**





# THANK YOU



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