

REPORT

Report of the Fellow who availed Fellowship / Training under Human Resource Development for Health Research.

1. Name and designation of Fellow : Dr. Manish Narang
2. Address : A-16/FI, A-Block, Dilshad Garden, Delhi-110095, India.
3. Type of Fellowship and period : HRD Fellowship - Long Term Fellowship/Training in Indian Institute
Period: 11 August 2014-10 August 2015
4. Duration of fellowship : 1 Year (11 August 2014-10 August 2015)
5. Frontline area of research in which research was carried out : Gastroenterology (Pediatrics)
6. Name & address of mentor and hostinstitute : Dr. AS Puri, Deptt. of Gastroenterology
GB Pant Institute of Post Graduate Medical Education and Research, Delhi, India
7. Highlights of work conducted
 - i) Technique/expertise acquired (Give in about 150 words) : Annexure 1
 - ii) Research results, including any papers prepared/submitted for publication (Give in about 300 words) : Annexure 2
 - iii) Proposed utilization of the experience in the Parent Institute. (Please specify the project developed whether originally proposed/ new project) : Annexure 3

Manish
Signature of Fellow

ANNEXURE 1

Technique/expertise acquired

My training was a one-year program devoted to the clinical and research training in Gastroenterology (Pediatric). My training included extensive experience in performing upper endoscopy, colonoscopy, endoscopic variceal band ligation and sclerotherapy, polypectomy, esophageal dilatation, liver and mucosal biopsies, percutaneous endoscopic gastrostomy (PEG) insertion, hydrogen breath tests and gastrointestinal motility studies. I received comprehensive training in gastrointestinal, nutritional, and hepatic disorders in infants, children, and adolescents. My research topic was "Celiac Disease and Helicobacter Pylori Infection in Children: What is the Link". Abstract for my research work has been submitted to 56th Annual Conference of Indian Society for Gastroenterology conference (ISGCON 2015) to be held in Indore, India.

Annexure 2

Research results, including any papers, prepared/submitted for publication

ABSTRACT DETAILS

Study Title: Celiac Disease and H. Pylori Infection in Children: Is there any Association?

Background & Objective: *Helicobacter pylori* (HP) infection can influence the inflammatory and immune responses in small intestine and therefore, the development and evolution of gluten related enteropathy. Our objective was to assess the relationship between celiac disease and HP infection in children.

Methods: Children (1-18 years) with confirmed celiac disease (CD) (n=324) who underwent upper gastrointestinal endoscopy with submission of gastric and duodenal biopsies were eligible for the study. Non-celiac patients referred for endoscopy were selected as controls. We studied proportion of HP prevalence in children with confirmed CD as compared to HP prevalence in reference group comprising non-celiac children referred for endoscopy. We also evaluated predictors of HP infection in children with celiac disease.

Results: Of the 324 participants with CD, gastric HP was seen in 37 (11.4%) patients. The prevalence of HP in patients without CD (50%, $P < 0.001$) was significantly higher. Among patients with CD, HP infection was most frequent in patients with Marsh IIIa. In the stepwise regression analysis for risk factors of HP infection in CD patients; presence of gastritis, anemia and absence of scalloping were found to be independent predictors in a multivariate set up.

Conclusion: CD and gastric HP infection have inverse relationship which raises the question whether development of HP infection confers protection against CD.

ANNEXURE 3

Proposed utilization of the experience in the Parent Institute

The training will be utilized for providing comprehensive care in hepatobiliary and gastrointestinal disorders. With the help of training, I will be able to provide a full range of diagnostic procedures and treatments related to the gastrointestinal tract, liver and pancreas including: acute and chronic liver disease, gastroesophageal reflux, inflammatory bowel disease, chronic diarrhea, constipation, malabsorption syndrome. Training will be utilized for providing esophagogastroduodenoscopy (upper endoscopy), flexible sigmoidoscopy and colonoscopy, liver biopsy and paracentesis. Training will also be utilized for development of research project in pediatric gastroenterology.