



**Dr. Vinay Chopra**  
MD (Pathology & Microbiology)  
Chairman & Consultant Pathologist

**Dr. Yugam Chopra**  
MD (Pathology)  
CEO & Consultant Pathologist

<b>NAME</b>	<b>: Mr. KULDEEP OJRA</b>	<b>PATIENT ID</b>	<b>: 1793974</b>
<b>AGE/ GENDER</b>	<b>: 35 YRS/MALE</b>	<b>REG. NO./LAB NO.</b>	<b>: 012503170016</b>
<b>COLLECTED BY</b>	<b>:</b>	<b>REGISTRATION DATE</b>	<b>: 17/Mar/2025 08:33 AM</b>
<b>REFERRED BY</b>	<b>: ROTARY HOSPITAL (AMBALA CANTT)</b>	<b>COLLECTION DATE</b>	<b>: 17/Mar/2025 08:37AM</b>
<b>BARCODE NO.</b>	<b>: 01527239</b>	<b>REPORTING DATE</b>	<b>: 18/Mar/2025 02:09AM</b>
<b>CLIENT CODE.</b>	<b>: KOS DIAGNOSTIC LAB</b>		
<b>CLIENT ADDRESS</b>	<b>: 6349/1, NICHOLSON ROAD, AMBALA CANTT</b>		

Test Name	Value	Unit	Biological Reference interval
ANTI TISSUE TRANSGLUTAMINASE (tTG) ANTIBODY IgA	7.647	IU/mL	NEGATIVE: < 20.0 POSITIVE: > 20.0

## IMMUNOPATHOLOGY/SEROLOGY

### ANTI TISSUE TRANSGLUTAMINASE (tTG) ANTIBODY IgA

ANTI TISSUE TRANSGLUTAMINASE

7.647

IU/mL

NEGATIVE: < 20.0

POSITIVE: > 20.0

ANTIBODY IgA  
*by ELISA (ENZYME LINKED IMMUNOASSAY)*

#### INTERPRETATION:

1. Anti-transglutaminase antibodies (ATA) are autoantibodies against the transglutaminase protein.
2. Antibodies to tissue transglutaminases are found in patients with several conditions, including coeliac disease, juvenile diabetes, inflammatory bowel disease, and various forms of arthritis.
3. In coeliac disease, ATA are involved in the destruction of the villous extracellular matrix and target the destruction of intestinal villous epithelial cells by killer cells.
4. Deposits of anti-tTG in the intestinal epithelium predict coeliac disease.
5. Celiac disease (gluten-sensitive enteropathy, celiac sprue) results from an immune-mediated inflammatory process following ingestion of wheat, rye, or barley proteins that occurs in genetically susceptible individuals. The inflammation in celiac disease occurs primarily in the mucosa of the small intestine, which leads to villous atrophy.

#### **CLINICAL MANIFESTATIONS RELATED TO GASTROINTESTINAL TRACT:**

1. Abdominal pain
2. Malabsorption
3. Diarrhea and Constipation.

#### **CLINICAL MANIFESTATION OF CELIAC DISEASE NOT RESTRICTED TO GIT:**

1. Failure to grow (delayed puberty and short stature)
2. Iron deficiency anemia
3. Recurrent fetal loss
4. Osteoporosis and chronic fatigue
5. Recurrent aphthous stomatitis (canker sores)
6. Dental enamel hypoplasia, and dermatitis herpetiformis.
7. Patients with celiac disease may also present with neuropsychiatric manifestations including ataxia and peripheral neuropathy, and are at increased risk for development of non-Hodgkin lymphoma.
8. The disease is also associated with other clinical disorders including thyroiditis, type I diabetes mellitus, Down syndrome, and IgA deficiency.

#### **NOTE:**

1. The finding of tissue transglutaminase (tTG)-IgA antibodies is specific for celiac disease and possibly for dermatitis herpetiformis. For individuals with moderately to strongly positive results, a diagnosis of celiac disease is likely and the patient should undergo biopsy to confirm the diagnosis.

2. If patients strictly adhere to a gluten-free diet, the unit value of IgA-anti-tTG should begin to decrease within 6 to 12 months of onset of dietary therapy.

#### **CAUTION:**

1. This test should not be solely relied upon to establish a diagnosis of celiac disease. It should be used to identify patients who have an increased probability of having celiac disease and in whom a small intestinal biopsy is recommended.



**DR.VINAY CHOPRA**  
CONSULTANT PATHOLOGIST  
MBBS, MD (PATHOLOGY & MICROBIOLOGY)

**DR.YUGAM CHOPRA**  
CONSULTANT PATHOLOGIST  
MBBS , MD (PATHOLOGY)





**Dr. Vinay Chopra**  
MD (Pathology & Microbiology)  
Chairman & Consultant Pathologist

**Dr. Yugam Chopra**  
MD (Pathology)  
CEO & Consultant Pathologist

<b>NAME</b>	: Mr. KULDEEP OJRA	<b>PATIENT ID</b>	: 1793974
<b>AGE/ GENDER</b>	: 35 YRS/MALE	<b>REG. NO./LAB NO.</b>	: 012503170016
<b>COLLECTED BY</b>	:	<b>REGISTRATION DATE</b>	: 17/Mar/2025 08:33 AM
<b>REFERRED BY</b>	: ROTARY HOSPITAL (AMBALA CANTT)	<b>COLLECTION DATE</b>	: 17/Mar/2025 08:37AM
<b>BARCODE NO.</b>	: 01527239	<b>REPORTING DATE</b>	: 18/Mar/2025 02:09AM
<b>CLIENT CODE.</b>	: KOS DIAGNOSTIC LAB		
<b>CLIENT ADDRESS</b>	: 6349/1, NICHOLSON ROAD, AMBALA CANTT		

Test Name	Value	Unit	Biological Reference interval

2. Affected individuals who have been on a gluten-free diet prior to testing may have a negative result.  
3. For individuals who test negative, IgA deficiency should be considered. If total IgA is normal and tissue transglutaminase (tTG)-IgA is negative there is a low probability of the patient having celiac disease and a biopsy may not be necessary.  
4. If serology is negative or there is substantial clinical doubt remaining, then further investigation should be performed with endoscopy and bowel biopsy. This is especially important in patients with frank malabsorptive symptoms since many syndromes can mimic celiac disease. For the patient with frank malabsorptive symptoms, bowel biopsy should be performed regardless of serologic test results.  
5. The antibody pattern in dermatitis herpetiformis may be more variable than in celiac disease; therefore, both endomysial and tTG antibody determinations are recommended to maximize the sensitivity of the serologic tests.

\*\*\* End Of Report \*\*\*



DR.VINAY CHOPRA  
CONSULTANT PATHOLOGIST  
MBBS, MD (PATHOLOGY & MICROBIOLOGY)

DR.YUGAM CHOPRA  
CONSULTANT PATHOLOGIST  
MBBS , MD (PATHOLOGY)

