



“बेटी बचाओ, बेटी पढ़ाओ”

JAYOTI VIDYAPEETH WOMEN'S UNIVERSITY, JAIPUR
Faculty of Ayurvedic Science

FacultyName	-	JV'n Dr. Jitendra Kumawat Teaching Methodology of Rachana Sharir
Program	-	BAMS 1 st Year
Course	-	Rachana Sharir
Session	-	liver

Academic Day starts with–

Greeting with saying ‘Namaste’ by joining Hands together following by 2-3 Minutes Happy session, Celebrating birthday of any student of respective class and National Anthem.

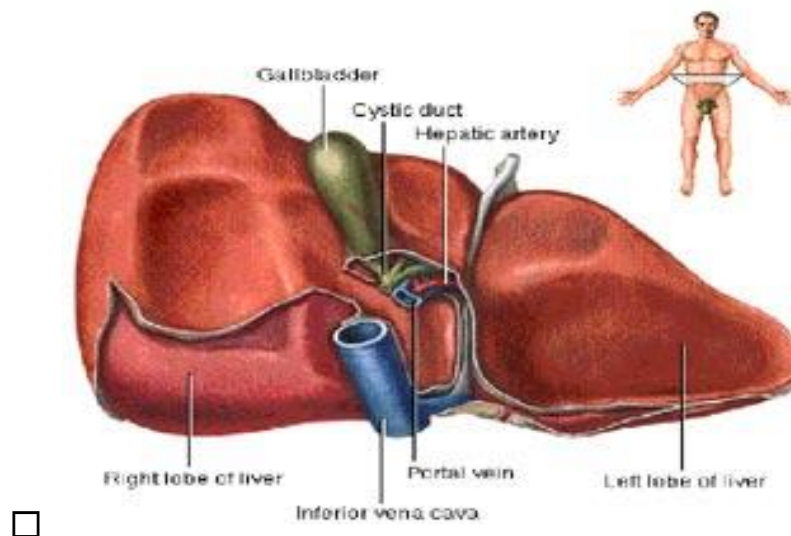
Lecture Starts with-

- **Review of previous Session-ureters**
- **Topic to be discussed today- liver**

Introduction:

- The liver is the largest gland in the body. Occupies mainly in the rthypochondrium, epigastrium and partly in to the lt. Hypochondrium.
- It is reddish brown, very soft like jelly and its weight about 1.6 to 1.3 kg. Almost completely covered with peritoneum.

- It is most of the liver is covered by ribs and costal cartilages.
- It has five surfaces. These are: 1. Anterior 2. posterior 3. Superior 4. Inferior and 5. Right surface.
- It has five borders. These are: 1. Anterior 2. Posterosuperior 3. Posteroinferior 4. Inferior 5. Right lateral.
- It has five fissures. These are fissures for ligamentum venosum, ligamentum teres, groove for inferior vena cava, Fossa for bladder and porta hepatis.



LOBES OF THE LIVER;

- The liver is divided into right and left lobes by the attachment of the falciform ligament anteriorly and superiorly.
- The right lobe is much larger than the left lobe, and presents the caudate and quadrats lobes.
- The left lobe of the liver is much smaller than the right lobe and forms only one-sixth of the liver.



RIGHT LOBE OF LIVER-

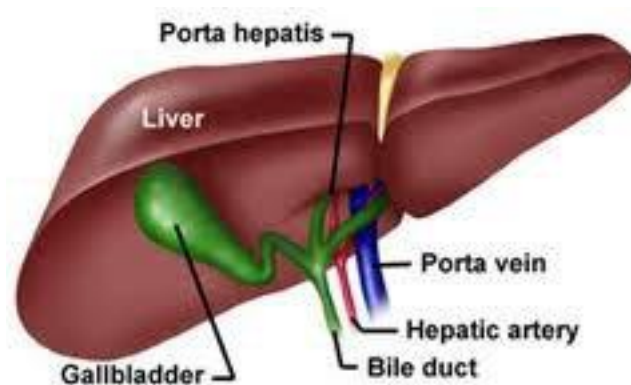
- The right lobe is much larger than the left lobe and forms five sixth of the liver. It contributes to all the five surface of the liver, and presents the caudate quadrate lobes.
- 1. The caudate lobe is situated on the posterior surface and it is connected to the right lobe of the liver by the caudate process.
- 2.The quadrate lobe is situated on the inferior surface and is rectangular in shape.

LEFT LOBE OF THE LIVER-

- The left lobe of the liver is much smaller than the right lobe and forms only one sixth part of the liver.
- It is flattened from above downwards.
- Near the fissure for the ligamentum venosum.
- It is inferior surface presents a rounded elevation, called the omental tubersity.

PORTA HEPATIS-

- The porta hepatis is a deep, transverse fissure about 5cm long, situated on the inferior surface of the right lobe of the liver.
- It lies between the caudate lobe above and the quadrate lobe below and in front.
- The portal vein, the hepatic artery and hepatic plexus of nerve enter the liver through the porta hepatis.
- The lips of the porta hepatis provide attachment to the lesser omentum.



PERITONEAL RELATION OF LIVER-

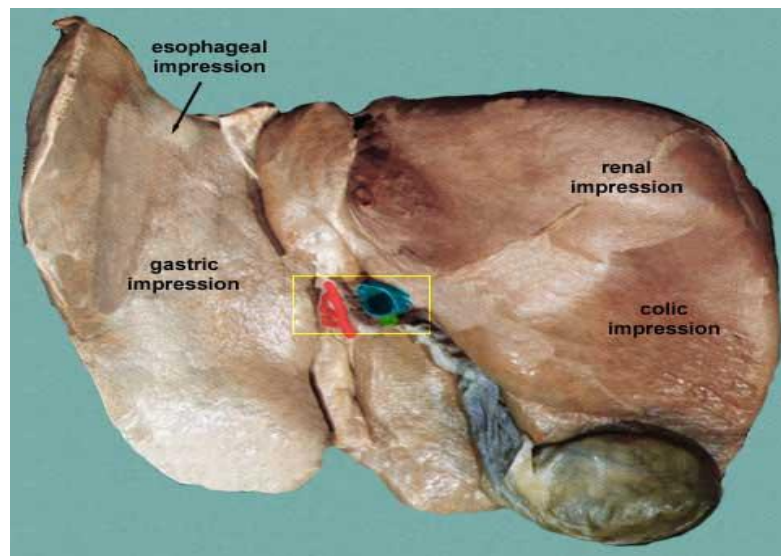
- Most of the liver is covered by peritoneum. The areas not covered by peritoneum are as follows:
 1. Triangular bare area on the posterior surface of the right lobe.
 2. The groove for the inferior vena cava.
 3. The fossa for the gall bladder.
 4. The lesser omentum.

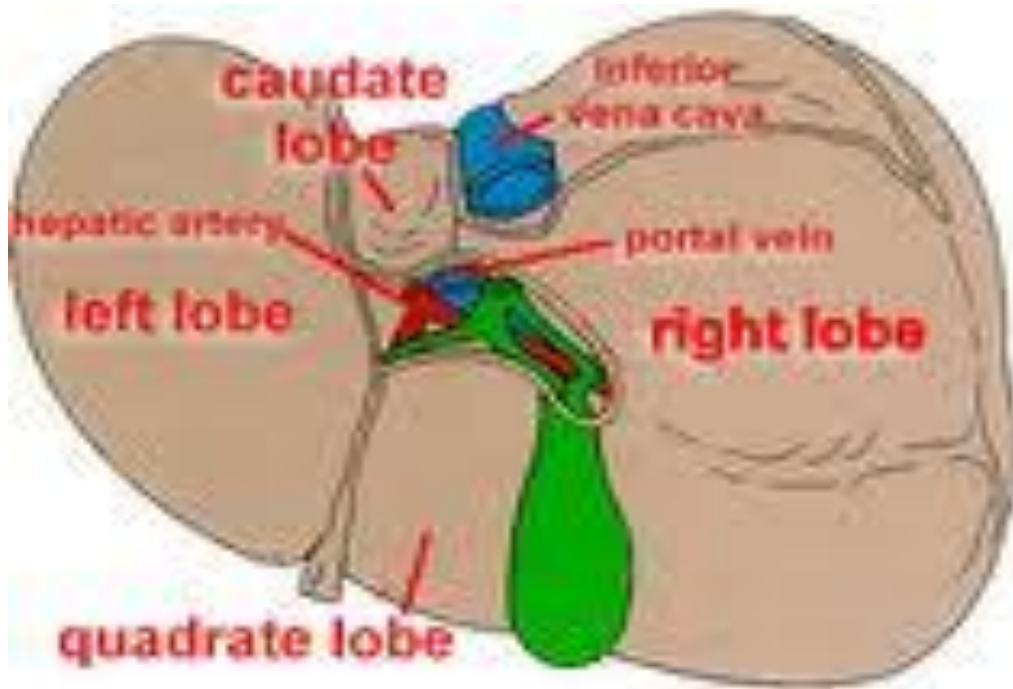
VISCERAL RELATIONS OF THE ANTERIOR SURFACE OF THE LIVER-

1. **Anterior surface-** The anterior surface is triangular and convex. It is related to the xiphoid process and the anterior abdominal wall in the median plane. The falciform ligament is attached to this surface a little to the right of the median plane.

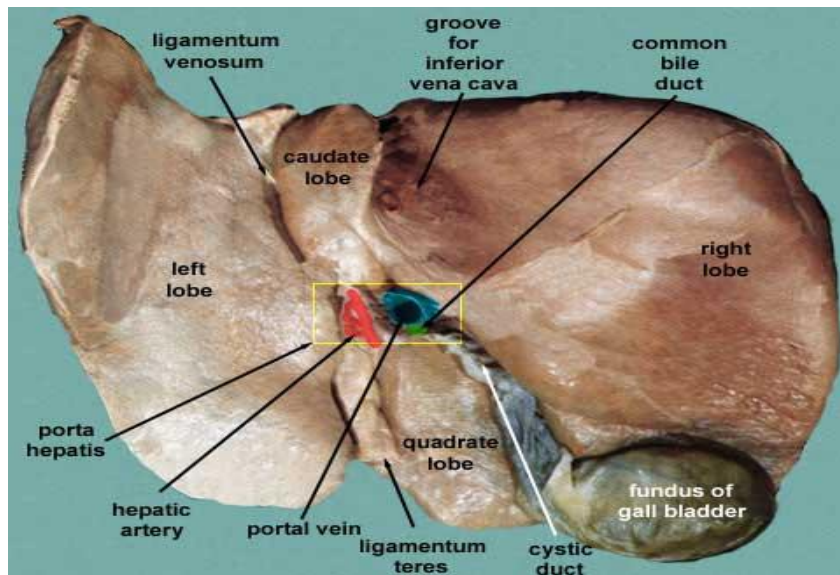
VISCERAL RELATIONS OF THE POSTERIOR SURFACE OF THE LIVER-

- The posterior surface is triangular. Its middle part shows a deep concavity for the vertebral column. Others relations are follows::
 1. The bare area is related to the diaphragm.
 2. The caudate lobe lies in the superior recess of the lesser sac.
 3. The groove for the inferior vena cava.
 4. The posterior surface of the left is marked by the oesophageal.





VISCERAL RELATIONS OF THE INFERIOR SURFACE OF THE LIVER;



VISCERAL RELATIONS OF THE SUPERIOR SURFACE OF THE LIVER-

- The superior surface is quadrilateral and shows a concavity in the middle. This is the cardiac impression.

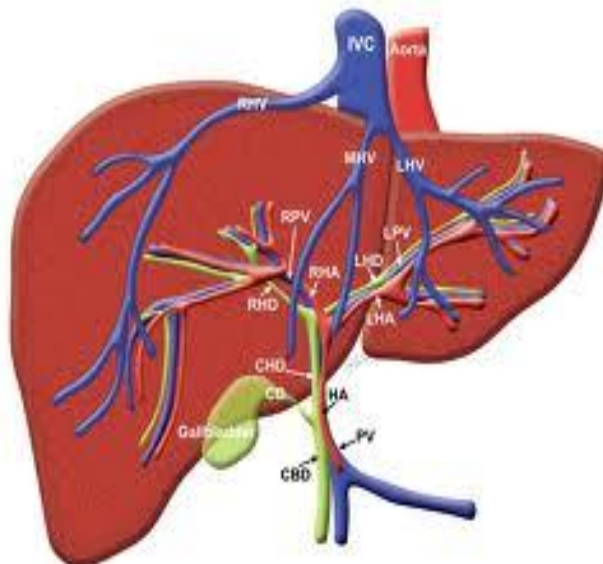
- On each side of the impression the surface is convex to fit the dome of the diaphragm. The diaphragm separates this surface from the pericardium and the heart in the middle and from the pleura and lungs on each side.

VISCERAL SURFACE OF THE RIGHT SURFACE OF THE LIVER;

- The right surface is quadrilateral and convex. It is related to the diaphragm opposite the 7th to 11th ribs in the midaxillary line.
- It is separated by the diaphragm from the pleura up to the 10th rib, and from the lung up to the 8th rib.

BLOOD AND NERVE SUPPLY-

- The liver receives 20% of its blood supply through the hepatic artery and 80% through the portal ven.
- The liver receives its nerve supply from the hepatic plexus contains both sympathetic and parasympathetic.



APPLIED ANATOMY-

- In the infra sternal angle, the liver is examination on percussion.
- Inflammation of the is referred to as hepatitis.
- The liver tissue undergoes fibrosis and shrinks this is called cirrhosis of the liver.
- Liver biopsy needle is passed through rt. 8th inter-costal space.

Lesson deliverance (ICT)-

➤ PPT (21 Slides)

- **Questions to check understanding level of students-**
 - Describe liver
- Next topic: spleen
- **Academic Day ends with** –National song 'Vande Mataram'