

APRIL - 2001

[KD 044]

Sub. Code : 1651

M.Ch. DEGREE EXAMINATION.

(Higher Specialities)

Branch IV — Genito Urinary Surgery

(Revised Regulations)

**Paper I — BASIC SCIENCE APPLIED TO GENITO-
URINARY SURGERY**

Time : Three hours

Maximum : 100 marks

1. Describe the development of male genitalia. Discuss the management of Extrophy-Epispadias complex. (25)
2. Describe the various growth factors with special reference to their role in the development of prostatic hypertrophy. (25)
3. Short notes on : (5 × 10 = 50)
 - (a) Sonourethrograph
 - (b) Hypokalemia
 - (c) Tumor Necrosis Factor
 - (d) Mag III
 - (e) Ambulatory Urodynamics.

NOVEMBER - 2001

[KE 044]

Sub. Code : 1651

M.Ch. DEGREE EXAMINATION

(Higher Specialities)

(Revised Regulations)

Branch IV — Genito Urinary Surgery

Paper I — BASIC SCIENCES AS APPLIED TO GENITO-URINARY SURGERY

Time : Three hours

Maximum : 100 marks

Answer ALL questions.

- 1 Discuss effect of drugs on the ureter. (25)
- 2 Discuss postobstructive diuresis. (25)
- 3 Write briefly on : (5 × 10 = 50)
 - (a) Zonal Anatomy of the Prostate
 - (b) Risk factors in excretory urography
 - (c) Antibody – coated Bacteria
 - (d) Residual urine volume determination
 - (e) Sperm motility.

MARCH - 2002

[KG 044]

Sub. Code : 1651

M.Ch. DEGREE EXAMINATION.

(Higher Specialities)

(Revised Regulations)

Branch IV — Genito-Urinary Surgery

**Paper I — BASIC SCIENCES AS APPLIED TO
GENITO-URINARY SURGERY**

Time : Three hours

Maximum : 100 marks

Answer ALL questions.

1. Discuss the vascular anatomy of the kidney and its importance to the urologist in calculus disease. (25)
2. Discuss the significance of Free/total PSA, PSA-density and PSA velocity in clinical practice. (25)
- 3 Write briefly on : (5 × 10 = 50)
 - (a) Hyper oxaluria.
 - (b) Premature Ejaculation
 - (c) Lohexol.
 - (d) Testicular Torsion.
 - (e) Oncocytoma.

APRIL - 2004

[KK 044]

Sub. Code : 1651

M.Ch. DEGREE EXAMINATION.

(Higher Specialities)

(Revised Regulations)

Branch IV — Genito-Urinary Surgery

Paper I — BASIC SCIENCES APPLIED TO GENITO
URINARY SURGERY — I

Time : Three hours

Maximum : 100 marks

Theory : Two hours and
forty minutes

Theory : 80 marks

M.C.Q. : Twenty minutes

M.C.Q. : 20 marks

Answer ALL questions.

A. Essay :

(2 × 15 = 30)

(1) Describe the anatomy of Retroperitoneum and discuss the management of idiopathic retro peritoneal fibrosis with bilateral hydrouretero nephrosis with azotemia. (15)

(2) Discuss the neuroanatomy and neuro physiology of erection and discuss role of centrally acting drugs in management of erectile dysfunction. (15)

B. Write short notes on :

(10 × 5 = 50)

- (1) Bladder endometrium.
- (2) Urological complications following haemorrhoid sclerotherapy.
- (3) Premature ejaculation.
- (4) Embryo genesis and zonal anatomy of prostate gland.
- (5) Role of TRUS in Urology.
- (6) Mixed gonadal dysgenesis.
- (7) Post obstructive diuresis phenomenon.
- (8) Balanitis Xerotica Obliterans (BXO).
- (9) Prostatic specific antigen.
- (10) Varicocele vis a vis male infertility.

AUGUST - 2004

[KL 044]

Sub. Code : 1651

M.Ch. DEGREE EXAMINATION.

(Higher Specialities)

(Revised Regulations)

Branch IV — Genito-Urinary Surgery

**Paper I — BASIC SCIENCES APPLIED TO GENITO
URINARY SURGERY — I**

Time : Three hours

Maximum : 100 marks

**Theory : Two hours and
forty minutes**

Theory : 80 marks

M.C.Q. : Twenty minutes

M.C.Q. : 20 marks

Answer ALL questions.

I. Essay : (2 × 15 = 30)

**(1) Discuss in detail the pathophysiology of
Acute Renal Failure and its management.**

**(2) Describe the anatomy and innervation of
male urethra, the Rhabdo Sphincter and the corpora
cavernosa.**

II. Write short notes on : (10 × 5 = 50)

(a) CT angiography.

(b) Contrast induced nephropathy.

(c) Treatment of hyponatremia.

(d) Captopril Renography.

(e) Circumcaval ureter.

(f) Asymptomatic bacteriuria.

(g) Mycophenolate mofetil.

(h) Chancroid.

**(i) Office Urinary culture its advantages,
disadvantages.**

(j) Hyperchloraemic acidosis.

FEBRUARY - 2005

[KM 044]

Sub. Code : 1651

M.Ch. DEGREE EXAMINATION.

(Higher Specialities)

(Revised Regulations)

Branch IV — Genito — Urinary Surgery

**Paper I — BASIC SCIENCES APPLIED TO GENITO
URINARY SURGERY — I**

Time : Three hours

Maximum : 100 marks

**Theory : Two hours and
forty minutes**

Theory : 80 marks

M.C.Q. : Twenty minutes

M.C.Q. : 20 marks

Answer ALL questions.

I. Essay :

(2 × 15 = 30)

(1) Discuss the gross anatomy of the prostate as it relates to the origin of BPH and cancer. (15)

(2) Discuss the mechanism of action of the newer immunosuppressants used in renal transplantation (excluding steroids, azathioprine, cyclosporine) (15)

II. Write Short notes on :

(10 × 5 = 50)

(a) The blood supply of the penis.

(b) Give the divisions and branches of the internal iliac artery.

(c) Filiform dilatation for urethral stricture disease.

(d) Basic principles of magnetic resonance imaging.

(e) Non-gonoccal urethritis.

(f) The genitourinary manifestation of filiarisis.

(g) What are the commonly used drugs in the treatment of genitourinary candidiasis?

(h) Fournier's gangrene.

(i) Congenital collecting system abnormalities apart from ureteropelvic junction obstruction.

(j) Laboratory tests to distinguish pre renal azotemia and acute tubular necrosis.

FEBRUARY - 2006

[KO 044]

Sub. Code : 1651

M.Ch. DEGREE EXAMINATION.

(Revised Regulations)

Branch IV — Genitourinary Surgery

**Paper I — BASIC SCIENCES APPLIED TO
GENTOURINARY SURGERY**

Time : Three hours

Maximum : 100 marks

**Theory : Two hours and
forty minutes**

Theory : 80 marks

M.C.Q. : Twenty minutes

M.C.Q. : 20 marks

Answer ALL questions.

I. Essay : (2 × 15 = 30)

**(1) Describe physiologic changes during
Laparoscopic Surgery.**

**(2) Embryology and clinical implications of renal
vein and inferior vena caval anomalies.**

II. Short notes : (10 × 5 = 50)

(a) Renin angiotensin system

(b) Oncogenes

(c) Hyperkalemia – Management

(d) Auto-regulation in kidney

(e) Autonomic Dysreflexia

(f) Abnormal sperms

(g) External sphincter – Recent concepts

(h) Human kallikrein – 2

(i) Noonan's syndrome

(j) Central control of micturition.

AUGUST - 2006

[KP 044]

Sub. Code : 1651

M.Ch. DEGREE EXAMINATION.

(Revised Regulations)

Branch IV — Urology

**Paper I — BASIC SCIENCES APPLIED TO
GENITOURINARY SURGERY**

Time : Three hours

Maximum : 100 marks

**Theory : Two hours and
forty minutes**

Theory : 80 marks

M.C.Q. : Twenty minutes

M.C.Q. : 20 marks

Answer ALL questions.

I. Essay :

(1) Discuss the surgical anatomy of the Ureter with special reference to Ureteroscopy. (20)

(2) Describe the mechanism of action of 5- α reductase inhibitors and its role in the management of prostatic diseases. (15)

(3) Describe the mechanism of penile erection of role played by sildinafil. (15)

II. Write short notes on:

(6 × 5 = 30)

(a) Vascular supply of Rt adrenal gland.

(b) Descent of testis from 6 month to 9 months intrauterine period.

(c) Causes of painless total haematuria.

(d) Equivocal UPJ obstruction.

(e) Urinary cast and its significance.

(f) Anatomical features of male pseudohermaphrodite.

FEBRUARY - 2007

[KQ 044]

Sub. Code : 1651

M.Ch. DEGREE EXAMINATION.

(Revised Regulations)

Branch IV — Urology

Paper I — BASIC SCIENCES APPLIED TO UROLOGY

Time : Three hours Maximum : 100 marks

Theory : Two hours and Theory : 80 marks
forty minutes

M.C.Q. : Twenty minutes M.C.Q. : 20 marks

Answer ALL questions.

I. Essay Questions :

1. Discuss the embryology and anatomy of vesicoureteric junction and trigone. (20)
2. Describe the lymphatic drainage of penis and its relevance in the management of carcinoma penis. (15)
3. Discuss the cost effective approach for the diagnosis of renovascular hypertension. (15)

II. Write short notes on :

(6 × 5 = 30)

1. Glitter cells.
2. H.H. Young.
3. Prevention of contrast nephropathy.
4. Performance status.
5. Creatinine clearance.
6. Post obstructive diuresis – management.

August-2007

[KR 044]

Sub. Code : 1651

M.Ch. DEGREE EXAMINATION.

(Revised Regulations)

Branch IV — Urology

Paper I — BASIC SCIENCES APPLIED TO UROLOGY

Time : Three hours

Maximum : 100 marks

**Theory : Two hours and
forty minutes**

Theory : 80 marks

M.C.Q. : Twenty minutes

M.C.Q. : 20 marks

Answer ALL questions.

I. Essay Questions :

1. Discuss the Anatomy of retroperitoneum.

Enumerate the main retroperitoneal tumors.

**Outline their managements with special reference
to difficulty encounters during surgery. (20)**

**2. Describe the structure and anatomical
relationship of prostate gland. (15)**

**3. Discuss the etiology of renal abscess. Describe the
diagnostic and current management strategies. (15)**

II. Write short notes. (6 × 5 = 30)

(a) Microscopic Examination of Urine.

(b) Recent Role of angiography in Urology.

**(c) Evaluation of anuria after renal
transplantation**

**(d) How to overcome anatomical problems in
Ureteroscopy.**

**(e) Management of small uretric stone in
pregnancy.**

(f) Urological Society of India.

August - 2009

[KV 044]

Sub. Code: 1651

M.CH DEGREE EXAMINATIONS

(Higher Specialities)

(Revised Regulations)

Branch IV – Urology

Paper I – BASIC SCIENCES APPLIED TO UROLOGY

Q.P. Code: 181651

Time: Three hours

Maximum: 100 Marks

ANSWER ALL QUESTIONS

Draw suitable diagrams wherever necessary.

I. Essays: 2 x 20 = 40 Marks

1. Discuss the various mechanisms involved in the descent of testis.
2. Discuss the development of normal bladder function and micturition control in infants and children.

II. Write short notes on: 10 X 6 = 60 Marks

1. Megacalycosis.
2. Knudson's two hit theory.
3. The Ice water test.
4. Five alpha reductase.
5. Apoptosis.
6. Nephrogram.
7. Renal pseudotumors.
8. Covert bacteriuria.
9. Latex allergy.
10. Intra-operative consultation for suspected ureteric injury.

August 2010

[KX 044]

Sub. Code: 1651

M.CH DEGREE EXAMINATIONS

**(Higher Specialities)
(Revised Regulations)**

**Branch IV – Urology
Paper I – BASIC SCIENCES APPLIED TO UROLOGY
*Q.P. Code: 181651***

Time: Three hours

Maximum: 100 Marks

ANSWER ALL QUESTIONS

Draw suitable diagrams wherever necessary.

I. Essays:

2 x 20 = 40 Marks

1. Describe the embryology of posterior urethral valve. Classify them and how will you evaluate and manage a child with PUV diagnosed at birth.
2. Describe the neuro vascular anatomy of penis and evaluation of a married man with erectile dysfunction.

II. Write short notes on:

10 X 6 = 60 Marks

1. ADAM (Androgen deficiency in aging male).
2. Oncogenes.
3. Ambulatory urodynamics.
4. Acute pyelonephritis in pregnancy.
5. Trospium chloride.
6. Pathogenesis of uric acid stone.
7. Bisphosphonates.
8. Haemospermia.
9. Von Mippel Sindan disease.
10. Detrusor sphincter dyssynergia.

August 2011

[KZ 044]

Sub. Code: 1651

**MASTER OF CHIRURGIAE (M.Ch.) DEGREE EXAMINATION
(SUPER SPECIALITIES)**

BRANCH IV – UROLOGY

BASIC SCIENCES APPLIED TO UROLOGY

Q.P. Code: 181651

**Time : 3 hours
(180 Min)**

Maximum : 100 marks

Answer ALL questions in the same order.

I. Elaborate on :

**Pages Time Marks
(Max.) (Max.) (Max.)**

- | | | | |
|---|----|----|----|
| 1. Discuss the Embryology of Horse –Shoe Kidney and management of Bilateral Stag horn calculi in Horse-Shoe Kidney. | 11 | 35 | 15 |
| 2. Describe the Lymphatic Drainage of Penis and its relevance in the management of Carcinoma Penis. | 11 | 35 | 15 |

II. Write notes on :

- | | | | |
|---|---|----|---|
| 1. Causes of management of fournier's gangrene. | 4 | 10 | 7 |
| 2. Contrast induced Nephropathy. | 4 | 10 | 7 |
| 3. Role of CT Angio in Urology. | 4 | 10 | 7 |
| 4. Clinical feature and management of Chancroid. | 4 | 10 | 7 |
| 5. Hyper Chloremic Acidosis in Urology. | 4 | 10 | 7 |
| 6. Embryogenesis and Zonal Anatomy of Prostate gland. | 4 | 10 | 7 |
| 7. Role of Trans Rectal Ultra Sonogram (TRUS) in Urology. | 4 | 10 | 7 |
| 8. Importance of Varicocele in Male Infertility. | 4 | 10 | 7 |
| 9. Testicular Torsion-Management | 4 | 10 | 7 |
| 10. Premature Ejaculation-management. | 4 | 10 | 7 |

[LB 044]

AUGUST 2012

Sub. Code: 1651

M.Ch – UROLOGY

Paper – I BASIC SCIENCES APPLIED TO UROLOGY

Q.P. Code: 181651

**Time : 3 hours
(180 Min)**

Maximum : 100 marks

Answer ALL questions in the same order.

I. Elaborate on :

	Pages (Max.)	Time (Max.)	Marks (Max.)
1. Mechanism of urinary continence in men and the role of urethral slings in male urinary stress incontinence.	16	35	15
2. Complications of the use of intestinal segments in the urinary tract.	16	35	15

II. Write notes on :

1. Tissue engineering in urology.	4	10	7
2. Metabolic complications of the use of intestinal segments in the urinary tract.	4	10	7
3. Port sites metastases.	4	10	7
4. Evaluation of the recurrent stone former.	4	10	7
5. Duloxetine in SUI.	4	10	7
6. Urological applications of botulinum toxin.	4	10	7
7. Bioeffects of shock wave lithotripsy.	4	10	7
8. Jejunal conduit syndrome.	4	10	7
9. Perfusion fluids in renal transplantation.	4	10	7
10. Multidrug resistance in renal cell carcinoma.	4	10	7

[LC 044]

FEBRUARY 2013

Sub.Code:1651

M.Ch-UROLOGY

Paper – I BASIC SCIENCES APPLIED TO UROLOGY

Q.P. Code:181651

**Time: 3 hours
(180 Min)**

Maximum :100 marks

I.Elaborate on:

(2x15marks=30marks)

1. Describe the Life cycle, presentation, diagnosis and treatment of Genito Urinary Schistosomiasis.
2. Describe the Embryogenesis, Anatomy, Variants and treatment of bladder exstrophy.

II. Write short notes on :

(10x7marks=70marks)

1. Embryology of ectopic ureter.
2. Inverted Papilloma.
3. Post obstructive diuresis.
4. Haemorrhagic cystitis.
5. Flow cytometry in Urologic practice.
6. Mixed Gonadal Dysgenesis
7. Single dose captopril test
8. Pathogenesis and management of urolithiasis in patients with Augmentation cystoplasty.
9. Fuhrman grading system in a patient with Renal cell carcinoma.
- 10 .Saturation Biopsy of the Prostate.

M.Ch. – UROLOGY
Paper – I BASIC SCIENCES APPLIED TO UROLOGY
Q.P.Code: 181651

Time: Three Hours

Maximum: 100 marks

I. Elaborate on:

(2X15=30)

1. Anatomy of inguinal lymph nodes as relevant to management of penile cancer and algorithm for management of Ilioinguinal lymph nodes involvement in a patient with squamous cell carcinoma of penis.
2. Embryology of classical extrophy – epispadias complex developmental anomalies leading to extrophy – epispadias complex and outline the management.

II. Write notes on:

(10X7=70)

1. Persistent müllerian duct syndrome.
2. Mechanism of extracorporeal shock wave action.
3. Ambulatory urodynamics.
4. Mitrofanoff's principle.
5. Pathophysiology of Renovascular hypertension.
6. Bacterial Resistance.
7. Etiology and treatment of Bladder Diverticula.
8. Adjuvant and Neoadjuvant therapies in bladder cancer.
9. Bladder Botulinum toxin application.
10. Define Renal agenesis, Aplastic Kidney, Hypoplastic Kidney, Cystic Dysplastic kidney and multicystic dysplastic kidney with diagrams.

(LE 044)

FEBRUARY 2014

Sub. Code:1651

M.Ch. – UROLOGY
Paper – I BASIC SCIENCES APPLIED TO UROLOGY
Q.P.Code: 181651

Time: Three Hours

Maximum: 100 marks

I. Elaborate on:

(2X15=30)

1. Briefly outline the mechanism of urinary continence in women and describe conservative treatment options in the management of urinary incontinence.
2. Briefly outline the patho-physiology of rejection and write about the recent development in the field of immunosuppression.

II. Write notes on:

(10X7=70)

1. Primary reninoma.
2. Bladder outlet obstruction index.
3. Function of epididymis.
4. Abdominal leak point pressure.
5. Solifenacin.
6. Blue light cystoscopy.
7. Familial prostate cancer.
8. Duckett's triad and PUV.
9. Cystinuria.
10. Levels of evidence.

[LH 044]

AUGUST 2015

Sub. Code: 1651

M.Ch. – UROLOGY

PAPER I – BASIC SCIENCES APPLIED TO UROLOGY

Q.P. Code: 181651

Time : Three Hours

Maximum : 100 marks

Answer ALL questions

I. Elaborate on:

(2 x 15 = 30)

1. Discuss the physiology of penile erection and the physiological basis of vasculogenic impotence.
2. Discuss the intra-renal vascular anatomy and its surgical implication in percutaneous renal surgeries.

II. Write notes on :

(10 x 7 = 70)

1. Stents in urology.
2. Hematospermia- Evaluation and management.
3. Medullary sponge kidney (MSK).
4. Urological manifestations of Diabetes Mellitus.
5. Anti-sperm antibodies.
6. Chyluria.
7. Testicular Microlithiasis.
8. Mitrofanoff procedure.
9. Oncogenes.
10. PDE-5 inhibitors.

(LJ 044)

AUGUST 2016

Sub. Code:1651

M.Ch. – UROLOGY

Paper I – BASIC SCIENCES APPLIED TO UROLOGY

Q.P.Code: 181651

Time: Three Hours

Maximum: 100 Marks

I. Elaborate on:

(2 x 15 = 30)

1. Metabolic evaluation of a patient suffering from urinary lithiasis and outline the dietary modifications and medical management for that individual based on the report.
2. Management of urological conditions during pregnancy.

II. Write notes on:

(10 x 7 = 70)

1. Familial renal cell carcinomas.
2. Nosocomial urinary tract infections.
3. Oxidative stress and the role of antioxidants in the treatment of male infertility.
4. TUR syndromes.
5. Vascular access in the management of CRF patient.
6. Radiation safety for the urologist.
7. Intra testicular germ cell neoplasia (ITGCN).
8. Botulinum toxins in the treatment of lower urinary tract dysfunction.
9. Renin Angiotensin Aldosterone System.
10. Penile premalignant lesions.

(LL 044)

AUGUST 2017

Sub. Code:1651

M.Ch. – UROLOGY

Paper I – BASIC SCIENCES APPLIED TO UROLOGY

Q.P.Code: 181651

Time: Three Hours

Maximum: 100 Marks

I. Elaborate on:

(2 x 15 = 30)

1. Discuss the natural defences of urinary tract and describe in detail the alterations in the host defence mechanisms which lead to infection?
2. Describe the embryology, presentation and management of Vesico-ureteric reflux.

II. Write notes on:

(10 x 7 = 70)

1. Ureterocalycostomy.
2. Antisperm antibody.
3. Apoptosis.
4. Management of ureteric and bladder injury during gynaecology procedure.
5. Ph., osmolality and adverse effects of irrigation fluids for Transurethral Resection.
6. Triplicate ureters.
7. Anatomy and physiology of Bladder Urothelium.
8. Siroky- nomogram.
9. Medullary sponge kidney.
10. Renal and systemic manifestations of hyperoxaluria.

(LN 044)

AUGUST 2018

Sub. Code: 1651

M.Ch. – UROLOGY

Paper I – BASIC SCIENCES APPLIED TO UROLOGY

Q.P.Code: 181651

Time: Three Hours

Maximum: 100 Marks

I. Elaborate on:

(2 x 15 = 30)

1. Pathophysiology and management of Neurogenic voiding dysfunction in a patient with spinal cord injury.
2. Discuss the embryology of testicular development, descent and management of abdominal testis.

II. Write notes on:

(10 x 7 = 70)

1. Blood supply of Ureter and its importance in surgery.
2. Prevention of calcium oxalate urolithiasis.
3. Applied anatomy of preputial skin.
4. Paediatric nephrocalcinosis.
5. Diagnosis of renal tubular acidosis.
6. Fistulas involving the ureter.
7. Localization of urinary tract infection.
8. Sonourethrogram.
9. Sertoli cell only tumor.
10. Resistive index and its role in urology.

(LP 044)

AUGUST 2019

Sub. Code: 1651

M.Ch. – UROLOGY

Paper I – BASIC SCIENCES APPLIED TO UROLOGY

Q.P. Code: 181651

Time: Three Hours

Maximum: 100 Marks

I. Elaborate on:

(2 x 15 = 30)

1. Pathogenesis of Urolithiasis.
2. Pathophysiology, investigations and management of renovascular hypertension.

II. Write notes on:

(10 x 7 = 70)

1. Preparation of an urological patient on anticoagulant and antiplatelet medications.
2. Management of complications related to ureteral stents.
3. TUR syndrome-Trans Urethral Resection of the prostate.
4. Investigation to detect early Genito urinary Tuberculosis.
5. Bacterial resistance and adherence – implications in urological practice.
6. Evaluation of live related donor.
7. Emphysematous pyelonephritis.
8. No scalpel vasectomy.
9. Osteoclastic inhibitors in the management of carcinoma of prostate.
10. Semen analysis.

(LQ 044)

FEBRUARY 2020

Sub. Code: 1651

M.Ch. – UROLOGY

Paper I – BASIC SCIENCES APPLIED TO UROLOGY

Q.P. Code: 181651

Time: Three Hours

Maximum: 100 Marks

I. Elaborate on:

(2 x 15 = 30)

1. Etiology, Pathophysiology, Investigations and Management of chyluria.
2. Pathophysiology, Classification system, Clinical stages, Diagnostic procedures and Therapy of urosepsis.

II. Write notes on:

(10 x 7 = 70)

1. Types, imaging of hyperparathyroidism and stone management of hyperparathyroidism.
2. Urodynamics and Management of over active bladder.
3. Anejaculation.
4. Technique of vasography and interpretation.
5. Antiplatelet drugs in the perioperative period.
6. Clinical significance and management of intratubular Germ cell neoplasm of the testis.
7. Pathophysiology of varicocele induced infertility.
8. Clinical feature and management of hydatid cyst in urology.
9. Pelvicalyceal anatomy in percutaneous renal surgery.
10. Anatomical and pathophysiological basis of vesicoureteric reflux.

(LR 044)

NOVEMBER 2020
(AUGUST 2020 SESSION)

Sub. Code: 1651

M.Ch. – UROLOGY

Paper I – BASIC SCIENCES APPLIED TO UROLOGY

Q.P. Code: 181651

Time: Three Hours

Maximum: 100 Marks

I. Elaborate on:

(2 x 15 = 30)

1. Vascular anatomy of the kidney and its importance with relevance to stone surgery.
2. Discuss the role of urodynamic studies in urological practice.

II. Write notes on:

(10 x 7 = 70)

1. Causes and management of Fourniers gangrene.
2. Contrast induced nephropathy
3. Embrology and zonal anatomy of prostate gland.
4. Evaluation of recurrent stone former.
5. Perfusion fluids in renal transplant.
6. Microscopic examination of urine
7. Inverted papilloma
8. Post obstructive diuresis
9. Radiation safety for urologist
10. Mechanism of extracorporeal shock wave lithotripsy.

(MCH 0821)

AUGUST 2021

Sub. Code: 1651

M.Ch. – UROLOGY

Paper I – BASIC SCIENCES APPLIED TO UROLOGY

Q.P. Code: 181651

Time: Three Hours

Maximum: 100 Marks

I. Elaborate on:

(2 x 15 = 30)

1. Discuss the embryology of horseshoe kidney and the management of bilateral calculi in a horseshoe kidney.
2. Describe the neurovascular anatomy of the penis and evaluation of a patient with erectile dysfunction.

II. Write notes on:

(10 x 7 = 70)

1. Mitrofanoff's principle.
2. Etiology and management of bladder diverticulum.
3. Marginal kidney donors.
4. Blue light cystoscopy.
5. Anti sperm antibodies.
6. Vascular access in the management of chronic renal failure patients.
7. Premalignant lesions of the penis.
8. Management of ureter and bladder injury during gynaecological procedures.
9. Function of epididymis.
10. Tethered cord syndrome.

THE TAMIL NADU DR.M.G.R. MEDICAL UNIVERSITY

(MCH 0822)

AUGUST 2022

Sub. Code: 1651

M.Ch. – UROLOGY

Paper I – BASIC SCIENCES APPLIED TO UROLOGY

Q.P. Code: 181651

Time: Three Hours

Maximum: 100 Marks

I. Elaborate on: **(2 x 15 = 30)**

1. Development of testis and management of B/L undescended testis.
2. Describe the lymphatic drainage of penis and management of nodal metastasis in Carcinoma penis.

II. Write notes on: **(10 x 7 = 70)**

1. Retrograde pyelography technique and indications.
2. Phosphodiesterase type 5 inhibitor: Role in Urology.
3. Cisplatin.
4. Clavien- Dindo classification of complications.
5. Difficult catheterization.
6. Development of urinary bladder.
7. Pathophysiology of renovascular hypertension.
8. Pathophysiology of obstructive uropathy.
9. Enzalutamide.
10. Basiliximab.

THE TAMIL NADU DR.M.G.R. MEDICAL UNIVERSITY

(MCH 0124)

JANUARY 2024

Sub. Code: 1651

M.Ch. – UROLOGY

PAPER I – BASIC SCIENCES APPLIED TO UROLOGY

Q.P. Code: 181651

Time: Three Hours

Maximum: 100 Marks

I. Elaborate on:

(2 x 15 = 30)

1. Classify renal injuries. Discuss clinical features, grading, investigations and management of renal trauma.
2. Etiology, clinical features, investigations and management of Pelvi-ureteric junction obstruction.

II. Write notes on:

(10 x 7 = 70)

1. Calyceal diverticulum.
2. Transrectal ultrasound in Urology.
3. Dapoxetine.
4. Acute tubular necrosis.
5. Benign renal tumours.
6. Lymphatic drainage of penis.
7. Nephrogenic Systemic Fibrosis.
8. Endometriosis.
9. Artificial urinary sphincters.
10. Pathophysiology of varicocele infertility.
