I. **Educational Purpose:** This elective may be part of the required nonmedical elective or may be taken alone. This elective is designed to teach the resident the fundamentals of diagnosis and management of commonly encountered urological disorders. The resident should be able to diagnose and manage urinary tract infections, diagnose kidney stones, understand the evaluation of hematuria, and understand the causes of urinary incontinence.

II. **Rationale:** Urological disorders are frequently seen in all age groups. It is important that the specialist in internal medicine be familiar with and is able to diagnose and manage common disorders such as urinary tract infection, incontinence, and erectile dysfunction. The resident should be able to diagnose and refer to a specialist in urological disorders serious problems such as malignancies of the kidney and bladder.

III. **Knowledge/Objectives:**
   - A. The resident should be familiar with the anatomy of the urogenital system.
   - B. The resident should be familiar with the nature of pain originating from the urogenital system.
   - C. The resident should be able to take a thorough history related to the urogenital system.
   - D. The resident should be able to evaluate urinary sediment.
   - E. The resident should be able to differentiate epididymitis from torsion of the testicle.
   - F. The resident should be able to examine the testicle for tumors.
   - G. The resident should be able to examine the prostate for enlargement and tumors.
   - H. The resident should be able to differentiate stress incontinence from overflow incontinence.
   - I. The resident should be able to diagnose and treat sexually transmitted diseases.
   - J. The resident should understand the differential diagnosis of hematuria.
   - K. The resident should be familiar with the evaluation of recurrent nephrolithiasis.
   - L. The resident should be familiar with the diagnosis and treatment of erectile disorders.

IV. **Educational Content:**
   - A. This is a two week rotation with a specialist in urological surgery. The resident will present to the specialist’s office at a predetermined time.
   - B. Patients are from the Midland and Ector county area, as well as surrounding West Texas counties. Patients encountered reflect the diverse nature of the pathology in the area with equal exposure to men and women of multiple ethnicities and socioeconomic backgrounds.
C. Disease mix: Common urological diseases will be emphasized and include benign prostatic hypertrophy, prostate cancer, urinary incontinence, erectile dysfunction, nephrolithiasis, and renal cell carcinoma.

D. Learning venues, type of clinical encounters, procedures, and services: The resident will have initial contact with the patient. Once the patient is seen and examined the resident will present the case to the attending and discuss diagnosis and management plans.
   i. The attending will assign specific reading topics.
   ii. The resident will do independent reading on urological diseases.
   iii. The resident will continue to attend the internal medicine required conferences and his/her own continuity clinics.
   iv. Procedures include evaluation of a urine sediment, prostate exam, observing cystoscopy, observing prostate biopsy, and insertion of a foley catheter.

V. Method of Evaluation:
A. Resident Performance: The clinical completes a written resident evaluation form provided by the internal medicine residency coordinator. The evaluation is competency-based, and uses a detailed assessment of the resident’s effort, progress and achievement on each core competency component. The faculty reviews the written evaluation in person with the resident and provides detailed feedback on the resident’s performance. All evaluations are available for resident review (excluding direct review of evaluations completed by resident colleagues) All evaluations are part of the resident file and are incorporated into the quarterly performance review by the Program Director.

B. Resident evaluation of the rotation: The resident will provide an anonymous written evaluation of the rotation and the clinical faculty member. These evaluations will be reviewed with the clinical faculty twice yearly.

VI. Rotation Specific Competency Objectives
A. Patient Care
   i. By the end of the rotation the resident will demonstrate the ability to perform an appropriate urological history and physical exam, documenting his/her findings in the medical record with an appropriate generation of a differential diagnosis list.
   ii. By the conclusion of the rotation the resident should be able to independently generate an appropriate management plan.
   iii. During this rotation, the resident will enhance his/her skills in obtaining and presenting a hypothesis driven history and problem-based assessment and plan of commonly encountered urological problems.

B. Medical Knowledge
   i. The resident will be evaluated by the supervising faculty for demonstration of appropriate analytic approach to urological conditions.
   ii. The resident will demonstrate knowledge expansion on current evidence-based practices in primary prevention of urological diseases.
   iii. The resident will gain and demonstrate understanding of the pathophysiology and prognosis of common urological conditions.
C. Practice-based Learning and Improvement
   i. The resident will demonstrate self-initiative in the use of information
technology to access and retrieve materials for self-education regarding
urological cases and demonstrate skills of critically appraising medical
literature and apply evidence to the care of patients.
   ii. The resident will be expected to show progressive learning throughout the
rotation, with emphasis on learning from any cognitive or procedural
errors. They are also expected to facilitate any quality improvement
initiatives in place.

D. Interpersonal and Communication Skills
   i. The resident is expected to demonstrate professional communication
skills throughout his/her interactions with patients and their families, the
clinical faculty member, and non-clinical staff involved in patient care.

E. Professionalism
   i. The resident is expected exhibit reliability in his/her clinical duties, as well
as integrity and respect in his/her interactions with patients, their family
members, colleagues, and all other members of the health care team.
   ii. The resident is expected to demonstrate appropriate sensitivity in regards
to patients’ age, sex, religious beliefs, and ethnicity.

F. System-Based Practice
   i. The residents are expected to interact with the clinical faculty staff, MCH
and MMH care systems, as well as gain insight and experience with
systems of care in the out-patient setting, and appropriately access
different facets of the health care system necessary for the care of their
patients.

VII. References:
A. http://www.urologychannel.com
B. Principals and Practice of Urology, M.A. Salem, Saunders Co. 2003