

A STUDY OF OBSTRUCTIVE URINARY TRACT INFECTION

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ABSTRACT

Urinary track infection is a liquid waste products by the kidney. Urine is a clear, transparent fluid tha normally has an amber colors. The average amount of urine excited in 24 hours is between 5 to 8 cups or 40 and 60 ounce. Chemi, urine is manially a watery solution of a salt and substance called urea and uric acid. Normally, it contains about 960 parts water to 40 parts solid matter.

Abnormally, it ma contains sugar, albumin, as in some form of kidney disease. Bile pigment, orabnormal quantity of one or another of its normally components. The kidney make urine by waste and extra water from the blood. The waste is call urea. If your urinary system is healthy, the bladder cam hold up to 16 ounce of urine comfortable for 2 to 5 hours.

INTRODUCTION

UTI occurred when bacteria enter the urinary track through the urethra and being to spread the track through the urethra being to spread in bladder. The urinary system is designed to keep out bacteria. But the defense sometimes fail . When the happen bacteria may take hold and grow into growinto a full blow infection in the urinary track. The most common UTI occurred mainly in women an affect the bladder and urethra. Infection of bladder.

The type of UTI is usually caused by Escherich coli is a type of bacteria commonly found in agastrointestinal track. . But sometimes other bacteria are the cause.

Having sex also may lead to the bladder infection., but you don't have to sexually active to develop one. This makes it easier for bacteria around the anus the entire the urethra and on travel to the bladder. Infection of the urethra.the type of UTI can happen when bacteria spread from the anus also be urethra. An infection of the urethra can also be caused by sexually transmitted infection.. This cahappen because women urethra are also to the vagina.

RISKY FACTORS

UTI. Are common in women. Many women have more than one UTI during their lifetime.

Risk factors for UTI that are special to women include.

Female anatomy. Women have a shorter urethra than men do. As a result, there is less distance for bacteria to reach the bladder.

Sexual activity. Being sexually active tends to lead to more UTI. Having a new sexual partner also increases risk.

Certain type of birth control. Using a diaphragm for birth control may increase the risk of UTI.

Menopause. After menopause, a decline in circulating estrogen causes changes in the urinary tract. The change can increase risk.

Other risk factors for UTI.

Urinary tract problem. Babies born with a problem with their urinary tract may have trouble urinating. Urinary tract can back up in the urethra, which can cause UTI.

Blockage in the urinary tract. Kidney stone or a trapped urine in the bladder. As a result, risk of UTI is high.

COMPLICATIONS

If not treated promptly and properly, lower urinary tract infection can lead to complications. But left UTI can cause serious health problems.

Complications of UTI may include

Repeat infection which means you have to or more UTI again.

Permanent kidney damage from a kidney infection due to an untreated UTI.

. Delivered a low birth weight or premature infant when a UTI occurred during pregnancy.

. A narrowed urethra is more common for having repeated infection due to an untreated UTI.

. Sepsis is a potential life-threatening complication of an infection. This is a risk especially if the infection is spreading up the urinary tract to the kidney. (12)

Symptoms of UTI.

- A need to pee more often than usual.
- Pain or discomfort when peeing.
- Sudden urge to pee
- Feeling as though unable to empty your bladder fully.
- Pain low down in your tummy. .
- Urinary tract cloudy, foul smelling or contains blood.
- Feeling generally unwell, achy and tired. (13)

HEALTH CLUSE AND COLORS.

The most optical colors for you urine ia a pale yellow. If this is a dark yellow or orange. It can mean you are becoming dehydrated. An orange urine colors indicate a series liver conducting. Dark brown cam because bye food or medication.

Never ignore a bright red urine b. That can signal a bladder or kidney issue that need a doctor attention.

URINARY track infection may cause an abnormal appearance of the urine such as cloudiness, brown or red colors, or a unusual smell. A UTI is nearly always accompanied by symptoms such

, needing to urinate more than normal. An intense feeling of needing to urinate, or lower abdominal pain, discomfort. Be sure to tell you doctor if you are experience any of these symptoms .coloudy Or smelly urine bythemselves should not be interpreted as indicator of a UTI. Bacteria is cause UTI is an antibiotic treat them. However any time you take antibiotic they can cause side effects. Side effects can include rash, dizziness, nausea, diarrhea, and yeast infection. More Serious side effects can include antibiotic infection or c. Difference infection. Which cause diarrhea that can lead to serve colon. Dimag and death. Call you healthcare professionals if you can a development any side effects while taking you want antibiotic. Sometimes other illness, such as Sexually transmitted. Have symptoms similar to UTI. You're health care professional can determine if a UTI or difference illness causing your symptoms and determine the best treatment.

MATERIAL AND METHODS

Study Design: The current study was a prospective observational study and case control. The study was conducted at GMC **Doda**

Sample collection. 10ml of syringe and a syringe filter holder, 13 mm in diameter. Nuclepore Polycarbonate membrane filter 13mm in diameter and 12 to 14 um pore side. This is a clear filter which can be disinfectant in domestic bleach and reused several times if used if carefully. Nytrell filter, 12 mm in diameter and 20um pore size., can be used if Polycarbonate filter is not available. This filter is not reusable. Alternative, paper filter such as whatmam No. 1 or No. 541 can be used.

Technique.

- Collection a fresh or a 24hourse urine sample, and check for the presence of proteinand blood.
- With blunt force, place a Polycarbonate, nytrell or paper filter in the filter holder. Closeand attach it to a10ml plastic syringe.
- Remove the plunger and fill the syringe with the well mixed urine sample upto the 10mlmark.
- Add a drop of physiological saline or lugol, iodine and cover with a coverslip.
- Count the no. Of egg and note the number per 10ml of urine b.

- More than 50egg/10ml indicated a heavy infection.

RESULTS AND OBSERVATIONS

I studied 100 patients of Obstructive urinary tract infection in the wards in from Jan 2023 to April 2023. Among 100 patients 50 were male and 50 were female. The mean age group was 51.29 yrs. The age range from 21 to 84 years and more common in fifth and sixth decade of life. The average duration of illness was 4.8 months, the range being 10 days to 12 months. The mean duration of hospital stay was 14 days that range between 4 days to 45 days. All patients had icterus (100%), 65% of patients had pain abdomen, of which 42% of patients had typical colicky type of abdominal pain. 44% of patients had fever, of which 31% of patients were associated with chills and rigors. Symptoms of complete biliary tract obstruction, clay coloured stools and high coloured urine presented in 30% of patients. Cachexia was seen in 29% of patients. Gall Bladder was palpable in 44% of patients, of which most were due to pancreatic and Periapillary malignancies. Urine examinations showed absent in urobilinogen in 42% of patients. Serum albumin range was 2.5-5.5 gm. %. Preoperatively all patients received three doses of Vit K and fresh frozen plasma in selective patients. Coagulation profile was monitored by measuring PT and INR. In our study we observed the most common cause of biliary tract obstruction was CBD stones (51%) Among these most of the patients were females (34 pts.. 67%). The second most common cause was carcinoma head of pancreas (24 %), followed by Periapillary carcinoma (10%).

DISCUSSION

Urinary tract infections are some of the most common bacteria infections are caused by both Gram negative and gram positive species. UTIs are categorized into uncomplicated and complicated and are a severe public health problem. This situation is being exacerbated by the rise in multidrug resistant strains. Uropathogens carry multiple virulence factors involved in the pathophysiology of UTI. These virulence factors are involved in invasion and colonization as well as in mediating the subversion of host defense. Knowledge about the mechanism of action of these virulence factors is being used to develop new therapeutic agents against UTI. There are currently several including vaccines targeting bacterial factors that are essential for initial attachment and disease progression and small molecule inhibitors that prevent adhesion receptor interaction.

References.

- 1 the urinary tract infections and work NIDDK, national Institute of diabetes and digestive and kidneydiseases.
 - 2 C. Dugdale, David, Female urinary tract,, MEDLINE PLUS MEDICAL EMCYCLOPEDIA.
 - 3.MATON, Anthea, Jean Hopkins, chareles william McLaughlin, Susan Johnson Maryanna Quon warner.David lahart, jill D. Englewood cliffs, New, jersey, USA Prentice hall. Isbn0-13_ 981176-1.
 - 4 Caldwell Hk, young WS III, LAJTHA A, lim R, oxytocin and vaspressin Genetics and behavioralimplications
 - 5 Handbook Baba, T, Murabayashi, s, Tomiyama, T Takebe k. Uncontrolled hypertension is association with a rapidprogression of nephropathy. And preserved renal function. The tohoku journal of Experimental medicine. 161.
 - 6 peripheral neuropathy patients UK. RETRIEVED 2014- 4_03-20
 - 7 BALK, ETHAN, adam, gaelen. P, kimmel. Hannah, Rofeberg, valerie, saeed, Iman, jeppson, Peter,Trikalinon, Thomas
 - 8 . Balk, ethan, m, refeberg. Valerie. N, Adam,. Gaelen. P kimmel, Hannah. of neurochemistry and molecular neurological. Neuroactive protein and Brellia
 9. Rossman I, Rodstein M, Bornstein A. Undiagnosed diseases in an aging population.
- Pulmonary embolism and bronchopneumonia. Arch Intern Med. 1974;133(3):366–9.
10. Heit JA. Venous thromboembolism: disease burden, outcomes and risk factors. J Thromb Haemost. 2005;3(8):1611–7.
 11. Stein PD, Beemath A, Olson RE. Trends in the incidence of pulmonary embolism and deep venous thrombosis in hospitalized patients. Am J Cardiol. 2005;95(12):1525–6.
 12. AHA. American Heart Association. Venous Thromboembolism - Statistics. Statistical Fact Sheet, 2004. 2004. Available at: <http://www.americanheart.org/downloadable/heart/1136823273598VenousThromb06.pdf>.
 13. Horlander KT, Mannino DM, Leeper KV. Pulmonary embolism mortality in the United States, 1979–1998: an analysis using multiple-cause mortality data. Arch Intern Med. 2003;163(14):1711–7.
 14. Heit JA, Silverstein MD, Mohr DN, Petterson TM, Lohse CM, O’Fallon WM, et al. The epidemiology of venous thromboembolism in the community. Thromb Haemost. 2001;86(1):452–63.