

# URINARY TRACT INFECTION (UTI) PANEL

MIRA GENETIX IS A CAP / CLIA CERTIFIED FULL-SERVICE LABORATORY THAT'S BEEN IN BUSINESS FOR 30 YEARS.

## ADVANTAGES:

- Tests for a broader range of pathogens which can identify polymicrobial infections that may be missed with traditional culture testing
- Rapid results in 24 – 36 hours can allow faster patient treatment and relief (same day results available in specific areas)
- Antibiotic Sensitivity Testing can provide personalized treatment recommendations
- Results can be easily accessed via web portal
- Helps prevent patient hospitalization
- Reduces prescription of unnecessary antibiotics



**>> There are over a 1 million emergency department visits and 100,000 admissions with UTI annually in the United States.**

## TESTING MENU:

Acinetobacter Baumannii  
Actinobaculum Schaali  
Aerococcus Urinae  
Pan-Candida Albicans, Glabrata,  
Parapsilosis, Tropicalis  
Citrobacter Freundii  
Corynebacterium Riegelii  
Klebsiella Aerogenes  
Enterobacter Cloacae  
Enterococcus Faecalis

Enterococcus Faecium  
Escherichia Coli  
Klebsiella Oxytoca  
Klebsiella Pneumoniae  
Morganella Morganii  
Mycoplasma Hominis  
Proteus Mirabilis  
Proteus Vulgaris  
Pseudomonas Aeruginosa  
Serratia Marcescens

Staphylococcus Aureus  
Streptococcus Agalactiae  
Staphylococcus Saprophyticus  
Coagulase Negative Staphylococci  
Providencia Stuartii

Traditional culture testing may only detect 6 pathogens with an error rate as high as 29%! Mira Genetix real-time DNA PCR testing can detect up to 17 pathogens with 100% specificity.

Traditional sensitivity testing only evaluates 7 antibiotics. Mira Genetix's Advanced Sensitivity Testing can evaluate up to 35 antibiotics.

## LEADER IN ANTIBIOTIC STEWARDSHIP

Mira Genetix offers a live sensitivity test which quickly gives confidence in how to treat the patient providing the MIC unlike many other molecular labs. Treat the patient with 100% confidence with our state of the art technology.



# SEXUALLY TRANSMITTED INFECTIONS (STI) PANEL

MIRA GENETIX IS A CAP / CLIA CERTIFIED FULL-SERVICE LABORATORY THAT'S BEEN IN BUSINESS FOR 30 YEARS.

## ADVANTAGES:

- Same Day Results
- Fewer false negatives with 100% accuracy
- Antibiotic gene resistance identification
- Can identify polymicrobial infections
- Easy to interpret results
- Can help avoid hospitalization
- One simple collection method



## TESTING MENU:

Atopobium Vaginae  
Bacteroides Fragilis  
BVAB2  
PAN-Candida (Albicans Glabrata,  
Parapsilosis, Tropicalis)  
Chlamydia Trachomatis  
\*Enterococcus Faecalis  
\*Escherichia Coli  
Gardnerella Vaginalis  
Haemophilus Ducreyi  
HSV1 & HSV2  
Megasphaera 1

Mycoplasma Genitalium  
Mycoplasma Hominis  
Neisseria Gonorrhoeae  
Pan - Lactobacillus  
Prevotella Bivia  
\*Staphylococcus Aureus  
\*Streptococcus Agalactiae (group B)  
Trichomonas Vaginalis  
Ureaplasma Urealyticum  
Megasphaera 2  
Mobiluncus Curtisii  
Mobiluncus Mulieris

*\*Reflex Sensitivities*

## » STI AND PCR HIGHLIGHTS:

- *STI are among the most common causes of illness in the United States and can cause a wide range of complications including infertility.*
- *According to the CDC, there are 20 million new cases of sexually transmitted infections each year concentrated from only 8 viruses and bacteria.*
- *Chlamydia trachomatis is the most common STI in the world.*
- *STI testing by PCR identifies pathogens by DNA/RNA which can make it possible to detect disease earlier with more accuracy and a higher sensitivity than traditional testing methods.*
- *PCR testing can also identify drug resistance and help improve antibiotic stewardship.*



# RESPIRATORY PATHOGEN PANEL (RPP) PANEL

MIRA GENETIX IS A CAP / CLIA CERTIFIED FULL-SERVICE LABORATORY THAT'S BEEN IN BUSINESS FOR 30 YEARS.

## RPP OFFERS:

- Faster Turnaround Time
- Higher Accuracy
- Improves Antibiotic Stewardship
- Antibiotic Gene Resistance Identification
- Reduces False Negative Test Results
- Reduces prescribing unnecessary antibiotics
- Identifies viral and bacterial coinfections



» *The Respiratory Panel enables quick detection of viral and bacterial pathogens allowing faster treatment time, more accurate results, and can help avoid unnecessary patient hospitalization.*

## Are you treating a Virus or a Bacteria?

### VIRUSES:

Adenovirus  
Coronavirus 229E  
Coronavirus HKU1  
Coronavirus NL63  
Coronavirus OC43  
Influenza A (Pan)  
Influenza A/H1-2009  
Influenza A/H3  
Influenza B  
Metapneumovirus (hMPV)  
Parainfluenza Virus 1  
Parainfluenza Virus 2

Parainfluenza Virus 3  
Parainfluenza Virus 4  
Resp. Syncytial Virus A  
Resp. Syncytial Virus B  
Rhinovirus  
Enterovirus (Pan)  
SARS-CoV-2  
Legionella Pneumophila  
Moraxella Catarrhalis

### BACTERIA:

Mycoplasma Pneumoniae  
\*Streptococcus Pneumoniae  
\*Staphylococcus Aureus

*\*Reflex Sensitivities*



# WOUND PANEL

MIRA GENETIX IS A CAP / CLIA CERTIFIED FULL-SERVICE  
LABORATORY THAT'S BEEN IN BUSINESS FOR 30 YEARS.



*We offer a comprehensive molecular test for  
Wound/Nail pathogens that can enhance patient  
care with evidence-based diagnostics.*



## MOLECULAR PCR WOUND PANEL BENEFITS:

- Turn around time as fast as 24 hours
- Can identify bacteria, viruses, parasites, and fungi in one test
- Begin treatment faster with more accurate results
- Simple sample collection and increased patient satisfaction

### TESTING MENU

Acinetobacter Baumannii  
Acremonium Strictum  
Aspergillus Fumigatus  
Aspergillus Niger  
Aspergillus Versicolor  
Bacteroides Fragilis  
Candida Albicans  
Candida Glabrata  
Candida Krusei  
Candida Parapsilosis  
Candida Tropicalis  
Citrobacter Freundii  
Clostridium Septicium

Enterobacter Aerogenes  
Enterobacter Cloacae  
Enterococcus Faecalis  
Enterococcus Faecium  
Epidermophyton Floccosum  
Escherichia Coli  
Fusarium Solani  
Kingella Kingae  
Klebsiella Oxytoca  
Klebsiella Pneumonia  
Microsporium Audouinii  
Microsporium Canis  
Morganella Morganii

Neofusicoccum Mangiferae  
Prevotella Loescheii  
Proteus Mirabilis  
Proteus Vulgaris  
Pseudomonas Aeruginosa  
Scopulariopsis Brevicaulis  
Serratia Marcescens  
Staphylococcus Aureus  
Staphylococcus Saprophyticus  
Strep. Agalactiae (Group B)  
Strep. Pyogenes (Group A)  
Trichophyton Interdigitale  
Trichophyton Rubrum



# GASTROINTESTINAL PANEL

MIRA GENETIX IS A CAP / CLIA CERTIFIED FULL-SERVICE LABORATORY THAT'S BEEN IN BUSINESS FOR 30 YEARS.



*We offer a comprehensive molecular test for Gastrointestinal pathogens that can enhance patient care with evidence-based diagnostics.*



## MOLECULAR PCR GASTROINTESTINAL PANEL BENEFITS:

- Turn around time as fast as 24 hours
- Increased sensitivity and specificity over traditional test methods
- Reduced costs of unnecessary prescriptions and urgent care visits
- Simple sample collection and increased patient satisfaction
- Can identify difficult to culture pathogens

### TESTING MENU

Adenovirus F40/41

Astrovirus

Campylobacter pool (coli, jejuni, upsaliensis)

Clostridium difficile (toxin A / B)

Cryptosporidium

E. coli O157

Enteraggregative E. coli (EAEC)

\*Shigella / EIEC

Enteropathogenic E. coli (EPEC)

Enterotoxigenic E. coli (ETEC)

Shiga-like toxin-producing E. coli (STEC) stx1

Entamoeba histolytica

Listeria monocytogenes

Enterovirus

H. Pylori

Plesiomonas shigelloides

\*Salmonella

Norovirus GI

Norovirus GII

Rotavirus A

Rotavirus B

Giardia lamblia

Sapovirus (I,II,IV)

Sapovirus G.V (V)

Vibrio pool (cholerae, parahaemolyticus, vulnificus)

Yersinia enterocolitica

Rotavirus C

*\*Reflex Sensitivities*



## ADVANTAGES:

- Rapid results in 24 – 48 hours
- Accurate and reliable toxicology results
- Easy to read patient report
- Lower drug cut-off concentrations to catch low positive results
- LIS which allows seamless communication between lab and clinic
- Around the clock customer care



## TYPES OF TESTING:

### Qualitative Testing

The EIA (Enzyme ImmunoAssay) provides presumptive testing for drug groups. Often called "screening," results are qualitative and result as positive or negative. Results from this method are presumptive and should never be considered a final result without LC/MS confirmation testing.

### Quantitative Testing

The LC/MS (Liquid Chromatography/Mass Spectrometry) provides confirmatory testing for a specific drug. This technique relies on the principles of LC/MS to separate mixtures with multiple components and provide molecular identity of individual components with high specificity and detection. Results are numerical and identify the exact drug and amount of drug detected in the urine sample.

## TESTING MENU:

### Alcohol Panel

### Amphetamine/Stimulants Panel

Amphetamine  
Methamphetamine  
Phentermine  
Ritalinic Acid

### Barbiturates Panel

Bulabital  
Phenobarbital

### Benzodiazepines Panel

7-Aminoclonazepam  
Alprazolam  
Lorazepam  
Nordiazepam  
Oxazepam  
Temazepam

### GABA Panel

Gabapentin  
Pregabalin

### Illicits Panel

Bath Salts (MDA) (MDEA) (MDPV)  
Cocaine  
Cotinine  
Dextromethorphan  
Dextrorphan  
Ecstasy (MDMA)  
Heroin  
Ketamine  
Mitragynine  
PCP  
Synthetic Cannabinoids (K2 Spice)  
THC

### Opiates/Opioids Panel

Buprenorphine  
Codeine  
Fentanyl  
Hydromorphone  
Hydrocodone  
Meperidine  
Methadone (EDDP)  
Morphine  
Naloxone

Naltrexone  
Oxycodone  
Oxymorphone  
Pentazocine  
Propoxyphene  
Tapentadol  
Tromadol

### SSRI/Tricyclics Panel

Amitriptyline  
Citalopram  
Clomipramine  
Desipramine  
Doxepin  
Fluoxetine  
Imipramine  
Paroxetine  
Sertraline

### Relaxants/Sleep Aids Panel

Baclofen  
Carisporadol  
Cyclobenzaprine  
Meprobamate  
Zolpidem