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## **OXIDATIVE STRESS PROFILE**

The oxidative stress profile offers a window into the delicate balance between free radicals and antioxidants in the body, reflecting cellular health and the potential risk of chronic disease. By assessing levels of coenzyme Q10, copper, zinc, GPX, SOD, selenium and other markers, physicians can anticipate risks associated with elevated oxidative stress, including cardiovascular disease, diabetes, cancer and neurodegenerative disorders.

#### **Biology**

- · Total antioxidant capacity
- · Measured antioxidant capacity
- Glutathione Peroxidase (GPX)
- Superoxide Dismutase (SOD)
- · Coenzyme Q10

- Zinc
- Selenium
- Copper
- · Copper: Zinc ratio
- Homocystein

- Anti-LDL oxidized IgG antibodies
- · 8OH-D Guanosine
- 8OH-D Guanosine : Creatinine ratio

## **NUTRITIONAL ASSESSMENT**

A nutritional assessment relies on the intersection of data related to the comprehensive measurement of nutrients (fats, fatty acids, carbohydrates, and proteins), the analysis of food hypersensitivities (25 IgG panel), and a thorough evaluation of dietary habits and preferences.

This analysis allows for an extremely granular assessment of an individual's nutritional status, providing crucial information about their diet and metabolic health such as:

- · The quality of fats they consume, offering insights into the risk of cardiovascular and metabolic diseases.
- Their ability to regulate blood sugar, providing indications of the risk of diabetes and metabolic dysfunction.
- Potential delayed food reactions based on foods to which they may be sensitive.

#### **Biology**

- Fasting blood glucose
- Insulin
- · Hemoglobin A1c (HbA1c)
- Insulin resistance (HOMA)
- Estimation of average blood glucose
- · Glycosuria
- Triglycerides
- Total cholesterol
- · HDL cholesterol
- · LDL cholesterol
- · Non-HDL cholesterol
- · Atherogenic index
- · Apolipoprotein A1
- Apolipoprotein B
- · Apolipoprotein A1:B ratio
- Lipoprotein A
- · Myristic acid
- · Palmitic acid
- Stearic acid
- · Palmitoleic acid
- · Cis-vaccenic acid
- Oleic acid
- Eicosatrienoic acid
- · Trans-vaccenic acid
- Trans-palmitoleic acid
- · Rumenic acid

- Elaidic acid
- Conjugated linoleic acid 2 C18:2 (trans-10, cis-12)
- Conjugated linoleic acid 3 C18:2 (cis-9, trans-12)
- · Linoleic acid
- · Gammalinolenic acid
- Dihomo-γ-linolenic acid
- · Arachidonic acid
- Total Omega-6
- · Alpha-linolenic acid
- · Eicosapentaenoic acid
- Docosahexaenoic acid
- · Omega-3 Total
- Omega-3 Index
- Omega-6 : Omega-3 ratio
- Arachidonic acid : Eicosapentaenoic acid ratio
- Linolenic acid : Dihomogammalinolenic acid ratio
- Egg white intolerance (IgG)
- Egg intolerance (IgG)
- · Cow's milk intolerance (IgG)
- Intolerance to alpha-lactalbumin (IaG)
- Beta lactoglobulin intolerance (IgG)

- · Casein intolerance (IgG)
- Intolerance to pork (IgG)
- Intolerance to chicken meat (IgG)
- Cod intolerance (IgG)
- Shrimp intolerance (IgG)
- Tuna intolerance (IgG)
- Salmon intolerance (IgG)
- Wheat intolerance (IgG)
- · Corn intolerance (IgG)
- Soy intolerance (IgG)
- Gluten intolerance (IgG)
- Nut intolerance (IgG)
- Cocoa intolerance (IgG)
- Potato intolerance (IgG)
- Garlic intolerance (IgG)
- Onion intolerance (IgG)
- Banana intolerance (IgG)Yeast intolerance (IgG)
- Tomato intolerance (IgG)
- Goat's milk intolerance (IgG)

#### **Anamnesis**

Nutritional assessment with your physician

## **NEUROTRANSMITTER ASSESSMENT**

The neurotransmitter assessment includes evaluation of dopamine, adrenalin, serotonin and noradrenalin levels, providing essential insight into the functioning of the nervous system and an individual's mental health. This assessment is an essential key to understanding how your own body works, day after day.

As major players in the regulation of mood, stress, sleep, learning and memory, neurotransmitter analysis helps identify potential imbalances that can contribute to disorders such as depression, anxiety, sleep disorders and attention deficit disorders.

#### **Biology**

- Dopamine
- 3,4-Dihydroxyphenylacetic acid (3.4 DOPAC)
- · Homovanillic acid
- Methoxy-4-hydroxyphenylglycol (MHPG)
- · Vanillylmandelic acid (VMA)
- Serotonin

- 5-Hydroxyindoleacetic acid (5-HIAA)
- Homovanillic acid: 5hydroxyindoleacetic acid (HVA:5-HIAA) ratio
- Adrenaline
- Noradrenaline

## **PSYCHOLOGICAL EVALUATION OF STRESS**

This assessment enables us to establish, at an early stage, each individual's capacity to absorb the stress to which they're subjected, so we can adopt stress management measures, particularly in terms of lifestyle, thus maintaining a healthy hormonal balance and preventing more serious conditions.

This is based on a combination of several parameters:

- Measurement of cortisol and DHEA concentrations throughout the day, to assess the biochemical expression of stress in the body.
- Analysis of Heart Rate Variability (HRV), reflecting the adaptability of the autonomic nervous system, which
  controls the heart's response to various stresses.
- Assessment of perceived stress levels, emotional symptoms, sleep patterns, interpersonal relationships and stress management strategies.

#### **Biology**

- · Awakening cortisol
- Awakening cortisol + 30 min
- Awakening cortisol + 30 min : Cortisol Awakening Response (CAR) ratio
- · 8pm cortisol
- · 8pm DHEAs

- 8pm cortisol: 8pm DHEA ratio
- Awakening cortisol: 8pm cortisol ratio

#### Medico-technical examinations

• Heart Rate Variability (HRV)

#### **Anamnesis**

 Stress assessment with your physician

## **HEMATOLOGY & IMMUNOLOGY**

Hematology and immunology tests evaluate blood and immune system components such as CBC, platelets, iron, zinc and more. These analyses help detect pathologies such as anemia, infections, certain nutritional deficiencies or immunoglobulin deficiencies, which can affect general health.

#### **Biology**

- Hemoglobin
- · Hematocrit
- Erythrocytes
- Mean Corpuscular Volume (MCV)
- Mean Corpuscular Hemoglobin Concentration (MCHC)
- Mean Hemoglobin Content (MHC) per red blood cell
- · Leukocytes

- Neutrophils
- Lymphocytes
- Monocytes
- Eosinophils
- Basophils

- · Platelets
- · Mean Platelet Volume (MPV)
- Iron
- Total Iron Binding Capacity (TIBC)
- · Saturation percentage
- Ferritin
- Transferrin
- · Iron : Transferrin ratio
- Zinc

## **VITAMIN PANEL**

This check-up detects potential deficiencies in vitamins A, B9, B12, D, and E, which may be the cause of various disorders:

- · Vitamin A is vital for eye health.
- Vitamin B9 is essential for cell development and can prevent birth defects.
- Vitamin B12 is crucial for red blood cell production and neurological function.
- Vitamin D plays a key role in bone and immune health, helps prevent osteoporosis and increases resistance to infection.
- · Vitamin E is key to cell protection against oxidative damage.

#### **Biology**

- · Vitamin A
- Vitamin B12
- · Vitamin B9 (Folates)
- · Vitamin D
- · Vitamin E

## **INFLAMMATORY WORKUP & PROTEIN ELECTROPHORESIS**

Essential for assessing the body's inflammatory state and the composition of proteins in the blood, they help screen for various pathologies such as inflammatory diseases, infections, autoimmune diseases, cardiovascular and liver diseases, as well as certain cancers.

#### **Biology**

- · Total proteins
- Alpha-1 globulins
- · Alpha-2 globulins
- · Beta globulins
- Gamma globulins
- Albumin

- Ultra-sensitive C-reactive Protein (CRP)
- Soluble urokinase plasminogen activator receptor (suPAR)
- Hyaluronic acid

## **VIRAL AND BACTERIAL WORKUP**

This work-up is essential for detecting infections caused by infectious agents such as Epstein-Barr Virus (EBV), Cytomegalovirus (CMV), Herpes Simplex Viruses (HSVs), the Hepatitis C Virus (HCV), Human Immunodeficiency Virus (HIV), the Hepatitis B Virus (HBV), Chlamydia, and Human Papillomavirus (HPV). Analysis of this work-up helps identify pathogens that may be responsible for a variety of conditions, from benign diseases such as mononucleosis to more serious conditions that may be caused by these infectious agents.

## Biology

- Epstein-Barr Virus (EBV)
- · Cytomegalovirus (CMV)
- Herpes Simplex Virus (HSV)
- Hepatitis C Virus (HCV)

- Human Immunodeficiency Virus (HIV)
- Hepatitis B Virus (HBV)
- Chlamydia
- · Human Papillomavirus (HPV)

## **ENDOCRINOLOGY ASSESSMENT**

The endocrine workup evaluates the functioning of the five main axes:

- Thyroid: measurement of TSH, free T3, free T4, urinary T3, iodine.
- Adrenal, with analysis of pregnenolone and DHEA sulfate.
- · Pancreatic, including insulin.
- · Gonadal, with assessment of testosterone, SHBG and FSH levels.
- · Pituitary, with prolactin analysis.

#### **Biology**

- TSH
- Free T3
- Free T4
- Urinary T3
- Iodine
- · Pregnenolone
- · DHEA sulfate
- · Total testosterone

- Free testosterone
- · Bioavailable testosterone
- · % Free Testosterone
- SHBG
- FSH
- Prolactin
- Insulin

## **LIVER ANALYSIS**

Liver function tests assess hepatic health by measuring markers such as enzymes (SGOT, SGPT), alkaline phosphatase, gamma-GT and total and direct bilirubin. Abnormal levels of these markers may indicate various liver disorders, such as hepatitis, hepatic steatosis or cirrhosis.

## Biology

- SGOT
- SGPT
- · Alkaline phosphatases
- Gamma-GT
- · Total bilirubin
- · Direct bilirubin
- · Indirect bilirubin

## **RENAL AND UROLOGICAL ASSESSMENTS**

The renal and urological assessments evaluate the health of the kidneys and urinary system, through tests such as creatinine, GFR calculation, cystatin C, uric acid, proteinuria, hematuria, leukocyturia, urine pH, and PSA. Its analysis enables early detection of pathologies such as renal failure, gout, urinary tract infections and prostate cancer.

### **Biology**

- Creatinine (blood)
- Creatinine (urine)
- Glomerular Filtration Rate (GFR)
- Cystatin C
- Uric acid
- PSA
- Free PSA
- Free PSA: Total PSA ratio

- Proteinuria
- Hematuria
- Leukocyturia
- Urine pH

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## HYDROMINERAL BALANCE ASSESSMENT

The hydromineral balance assessment evaluates the levels of sodium, potassium and chloride in the body, electrolytes essential for numerous physiological functions, such as regulation of osmotic pressure, blood pH and muscle function. Various pathologies such as dehydration, renal failure or hormonal imbalances can cause electrolyte imbalances that can lead to serious complications, such as cardiac, neurological or renal conditions.

#### **Biology**

- Sodium
- Potassium
- · Chlorures

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## **DNA METHYLATION**

Methylation is an important epigenetic process that regulates gene expression by adding methylated groups to DNA. This modification influences gene regulation, and thus many biological processes- some as fundamental as cell differentiation. Alterations in DNA methylation are correlated with chronological age. Too great a difference between biological and chronological age may be associated with a higher risk of developing a wide range of diseases, including cancers, neurological disorders, cardiovascular disease and metabolic disorders.

#### **Biology**

- · DNA Methylation
- MethylAge
- · DNA Hydroxymethylation

## **VASCULAR ULTRASOUND**

Vascular ultrasound can be used to examine blood vessels in different parts of the body, looking for stenoses, plaques, abnormal dilatations called aneurysms, or dissections. This technology also measures the speed of flow in the vessels. It can be used to detect pathologies such as arteritis of the lower members, carotid stenosis, dissecting diseases and aneurysms.

## **Imaging**

- · Left & right common carotid artery
- Left & right internal carotid arteries
- · Abdominal aorta
- · Left & right common femoral arteries

# **CERVICAL ULTRASOUND**

A cervical ultrasound examines the thyroid gland and lymph nodes, identifying potential abnormalities such as thyroid nodules, cysts or abnormal masses. This exam enables the physician to quickly diagnose pathologies such as thyroid disease or lymph node infections.

#### **Imaging**

- Adenopathies
- Left and right thyroid lobes
- Thyroid isthmus

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## **ABDOMINAL ULTRASOUND**

Abdominal ultrasound allows us to visualize the liver, gallbladder, kidneys, spleen, pancreas and bile ducts, and to detect abnormalities such as cysts, stones, tumors or dilated bile ducts.

For example, it can be used to diagnose conditions such as biliary lithiasis, cirrhosis and certain abdominal infections or tumors.

### **Imaging**

- · Spleen
- Liver
- · Biliary tract
- Gallbladder
- · Interhepatorenal fat

- Pancreas
- · Abdominal effusion
- · Left & right kidneys
- · Inginual hernia

## **PELVIC ULTRASOUND**

Pelvic ultrasound examines the uterus, ovaries, bladder and prostate. It can detect abnormalities in these organs, such as cysts, fibroids, tumors, abnormal fluids and infections.

#### **Imaging**

- Bladder
- · Douglas effusion
- Uterus

- Ovaries
- Prostate

# **DEXA SCAN**

This scan provides highly informative images of bone structure and body composition:

- Bone mineral density (particularly that of the spine & hips) is a crucial parameter for estimating risk for fractures. It also helps prevent age-related pathologies such as osteoporosis and sarcopenia.
- The distribution of fat mass, lean mass, Visceral Adipose Tissue (VAT), Subcutaneous Adipose Tissue (SAT), Resting Energy Expenditure (REE) and Skeletal Muscle Index (SMI) are all important indicators for the prevention of obesity, diabetes, cardiovascular disease and metabolic disorders.

#### **Imaging**

- Bone Mineral Density (BMD)
- · Bone Mineral Content (BMC)
- · Body fat
- · Lean body mass

- Visceral Adipose Tissue (VAT)
- Subcutaneous Adipose Tissue (SAT)
- Resting Energy Expenditure (REE)
- Skeletal Muscle Index (SMI)

## **CBCT SCAN**

Thanks to its ability to produce high-precision, 3D images, the CBCT scanner offers physicians detailed visualization of the body's internal structures.

This low-dose imaging solution is particularly useful for detecting various anomalies and pathologies, such as lung tumors, sinusitis and deep dental infections.

#### **Imaging**

- Lungs
- Sinuses
- Teeth

## **RETINAL & OPTIC NERVE SCANS (OCT)**

Optical Coherence Tomography (OCT) has established itself as a high-performance technique for examining the retina and optic nerve, without the need for pupillary dilation. Thanks to its advanced imaging resolution, it offers precise visualization of retinal tissues, enabling the diagnosis and monitoring of numerous ocular disorders such as age-related macular degeneration (AMD) and glaucoma.

More than just a screening tool for ocular pathologies, OCT reveals early signs of retinal cell dysfunction up to 10 years before the onset of neurodegenerative and cardiovascular pathologies, offering insight into general aging and potential risks to neurological, cardiovascular and metabolic health.

#### **Imaging**

- · Macular region
- · Papillary region
- · Macular OCT-A
- · Papillary OCT-A

## **ELECTROCARDIOGRAM**

The electrocardiogram (ECG) is an essential instrument in medicine for assessing heart health. Performed with next-generation equipment, this method records the heart's electrical activity through simple sensors placed on the skin, enabling visualization of heart rhythm and precise detection of abnormalities such as arrhythmias, myocardial infarction or other cardiac dysfunctions.

## **TENSIOMETER**

Blood pressure measurement is a key indicator of heart and blood vessel function. It enables the detection of high blood pressure, which is often asymptomatic and silent, but also a major risk factor for heart disease, stroke and other serious complications.

## A.G.E. READER

Advanced Glycation Endproducts (A.G.E.) are compounds that accumulate naturally with age, and can be accelerated by high-sugar diets and certain lifestyles. This examination enables us to assess their levels in the skin, offering valuable insight into metabolic health and tissue aging. Their excessive concentration is associated with various chronic diseases, such as diabetes, cardiovascular disease and tissue degeneration.

## **GRIP STRENGTH**

Performed using a dynamometer, this test measures muscle strength in the hand and forearm. Beyond muscle strength, however, it also serves as a barometer of general health. In particular, it helps assess the risk of chronic diseases such as cardiovascular disease and diabetes.

## **EXHALED GAS ANALYSIS**

Exhaled gas analysis is a non-invasive diagnostic method that assesses the concentrations of various gases present in exhaled breath, including hydrogen (H2), hydrogen sulfide (H2S), nitric oxide (NO) and various Volatile Organic Compounds (VOCs).

This technique can detect metabolic and microbial imbalances in the gastrointestinal tract, providing valuable information on digestive health and metabolism. Elevated exhaled hydrogen may, for example, indicate malabsorption of certain carbohydrates, such as lactose, while high levels of hydrogen sulfide may be associated with gastrointestinal disorders, such as Crohn's disease or Irritable Bowel Syndrome (IBS). Similarly, variations in nitric oxide levels can be linked to inflammatory or infectious conditions in the respiratory or digestive tract.

#### **Biology**

- Dihydrogen (H<sub>2</sub>)
- Hydrogen Sulfide (H₂S)
- Volatile Organic Compounds (VOCs)
- · Nitric Oxide (NO)

## **SPIROMETRY**

This exam measures the quantity and speed of air inhaled and exhaled. It provides essential information on lung capacity, airway function and the possible presence of obstructive or restrictive lung disease. By analyzing parameters such as Forced Expiratory Volume in One Second (FEV1), Forced Vital Capacity (FVC) and FEV1:FVC ratio, spirometry can detect conditions such as asthma, Chronic Obstructive Pulmonary Disease (COPD), pulmonary fibrosis or upper airway obstruction disorders.

## **TONAL SCREENING**

Through exposure to sounds of varying intensities and frequencies, this procedure evaluates the ability to perceive sounds at levels considered normal. The results obtained are decisive in identifying various disorders or hearing loss potentially due to noise exposure, infections, presbycusis or other causes of hearing impairment.

# **VISUAL ACUITY**

Visual acuity's a vital measure of a person's ability to see with sharpness and clarity. Obtained by testing a person's ability to distinguish objects at different distances and sizes, using a table of standardized optotypes, it's an important indicator of eye health and vision quality.

Reduced visual acuity can be a sign of various eye conditions, such as myopia, hyperopia, astigmatism or more serious pathologies like cataracts or macular degeneration.

## **360° CLINICAL EXAM**

Carried out by the physician, the clinical exam includes an in-depth discussion combined with a series of physical examinations involving palpation and exhaustive auscultation, aimed at identifying signs of disease, injury or physiological imbalance. This holistic assessment, covering all aspects of the body in depth, enables us to evaluate cardiovascular, respiratory, neurological and musculoskeletal health, as well as the digestive, urinary and endocrine systems, and to detect potential medical conditions at an early stage.

#### Clinical

- Temperature
- · Height
- Weight
- · Waist circumference
- Oral exam (gums, mouth ulcers, presence of bacteria (Propionibacterium acnes, Fusobacterium + Porphyromonas gingivalis))
- Integument exam (hair, nails, body hair)

- Eve exam.
- Dermal exam (face & body)
- Examination of cranial pairs
- Neck exam
- Neck circumference
- Clavicle exam
- Musculature exam (triceps, biceps, quadriceps)
- Hand exam (including thenar and hypothenar)
- · Cardiovascular exam (heart & pulse)

- · Abdominal exam
- · Postural exam
- Foot exam
- · Lung exam
- · Axillary region exam
- · Lumbar fossa exam
- · Breast exam

## **PERSONAL & FAMILY HISTORY**

Careful historical review is a cornerstone of any medical assessment, aimed at identifying an individual's risk profile for various pathologies. This exhaustive exam examines the patient's medical history, as well as that of their family, highlighting the genetic and environmental risk factors which may impact their health, such as cardiovascular disease, diabetes, cancer, neurological disorders and many others.

### Anamnesis

 Review your personal and family history with your physician.

# **SLEEP PROFILE EVALUATION**

This exhaustive assessment not only analyses sleep habits (duration & quality), but also, using the Epworth and STOP-BANG methodologies, the possible presence of underlying disorders such as sleep apnea, insomnia or restless leg syndrome. As these can significantly increase the risk of cardiovascular disease, cognitive or mood disorders, it's all the more important to detect them as early as possible.

#### **Anamnesis**

• Evaluate your sleep with your physician.

## PHYSICAL ACTIVITY PROFILE EVALUATION

Detailed assessment of physical activity is a key component of overall health analysis. Insufficient or excessive activity, as well as prolonged sedentary behavior, significantly increase the risk of developing conditions such as obesity, cardiovascular disease, type 2 diabetes and musculoskeletal disorders. This assessment will enable the physician to recommend a personalized physical activity plan in terms of type of exercise, frequency, duration, intensity (exercise zone & heart rate).

#### **Anamnesis**

· Evaluate your physical activity with your physician.

## **DERMATOLOGIC EXAM**

This check-up examines the health of the skin, hair and nails, and detects early signs of skin conditions. It's based on a cross-referenced clinical exam with an analysis of past skin conditions, skin and hair care habits, sun exposure, cutaneous allergies, and symptoms such as redness, itching, skin lesions, or other abnormalities.

By identifying risk factors for skin diseases such as eczema, psoriasis, fungal infections, cutaneous allergies and skin cancer, physicians can offer personalized preventive advice, tailored skin, hair and nail care recommendations, and regular screenings to prevent complications and promote long-term dermatological health.

#### Clinique

· Clinical dermatologic exam with your physician.

## **SEXUAL HEALTH ASSESSMENT**

This assessment provides a personalized response to the specific needs of each individual throughout the phases of their sexual and reproductive life.

It includes management of hormonal transitions such as menopause for women and andropause for men, a review of contraceptive options, menstrual cycle analysis and fertility support as part of a family planning process.

#### **Anamnesis**

· Sexual health assessment with your physician.

## POLLUTANT EXPOSURE EVALUATION

This assessment enables us to evaluate all the potential sources of pollution to which we're exposed. From cosmetic pollution to domestic, food and environmental pollution, all associated symptoms will be analyzed. Heavy metal pollution in particular will be analyzed, to detect possible mercury, arsenic or nickel poisoning. Whether caused by air pollution, contaminated water, cosmetics, household construction materials or food, exposure to these toxic substances can have serious health consequences, including neurological disorders, cardiovascular disease, kidney and liver dysfunction, as well as developmental disorders in children.

#### **Biology**

- Arsenic
- Nickel
- Mercury

#### **Anamnesis**

 Assessment of your pollutant exposure with your physician.