

# MASTERON®

## Drostanolone Propionate

Formula: C<sub>23</sub>H<sub>36</sub>O<sub>3</sub> (CAS-57-85-2, ATC-G03BA03)  
Molecular Weight: 360.5356 gm/mol  
Active life: 2-3 days  
Detection time: 3 weeks  
Anabolic/Androgenic ratio: 62:25

### DESCRIPTION:

Masteron® is a steroid compound that is described chemically as 17β-Hydroxy-2α-methyl-5α-androstan-3-one

Masteron® is a sterile solution of Drostanolone Propionate in Miglyol 840, Ethyl oleate, Benzyl benzoate, Benzyl alcohol.

Masteron® is a synthetic derivative of dihydrotestosterone, producing an anabolic effect and promoting protein synthesis as well as creating positive nitrogen balance in humans. Since it is a derivative of dihydrotestosterone, Drostanolone does not aromatize to estrogens.

Masteron® has significant anabolic and androgenic properties promoting an increase in strength and growth of muscle tissue while acting as an estrogen antagonist.

### CLINICAL PHARMACOLOGY:

Anabolic steroids are synthetic derivatives of testosterone. Certain clinical effects and adverse reactions demonstrate the androgenic properties of these drugs. Complete dissociation of anabolic and androgenic effects has not been achieved. The actions of anabolic steroids are thus similar to those of male sex hormones. Anabolic steroids suppress the gonadotropic functions of the pituitary and may exert a direct effect upon the testes. During exogenous administration of anabolic androgens, endogenous testosterone release is inhibited through inhibition of pituitary luteinizing hormone (LH). At large doses, spermatogenesis may be suppressed through feedback inhibition of pituitary follicle-stimulating hormone (FSH).

Drostanolone attaches to androgen receptors; increasing nitrogen retention and protein synthesis. Drostanolone acts on dihydrotestosterone modulated pathways as well.

Drostanolone is a potent estrogen antagonist and does not aromatize to estrogen, limiting expression of side effects often linked to estrogen such as water retention, gynecomastia, and some types of high blood pressure. Drostanolone undergoes hepatic metabolism with a half-life of 2-3 days after separation of the ester.

### INDICATIONS AND USAGE:

1. Rapidly restore muscle tissue atrophied during recovery from a traumatic injury.
2. Offset muscle catabolism in patients with a wasting syndrome.
3. Treat certain types of anemia which are non-responsive to first line agents.
4. Oestrogen antagonist in treatment of breast cancer.

### CONTRAINDICATIONS:

1. Not indicated for women, children, or the elderly.
2. Women who are pregnant or may become pregnant because of possible masculinization of the fetus.
3. Patients with nephrosis or the nephrotic phase of nephritis.
4. Patients with hypercalcemia.
5. Patients suffering from testicular cancer, prostate cancer, breast cancer, liver damage, kidney damage, stroke, high blood pressure, heart disease or respiratory problems.

### WARNINGS:

LIVER CELL TUMORS ARE REPORTED. MOST OFTEN THESE TUMORS ARE BENIGN AND ANDROGEN DEPENDENT, BUT FATAL MALIGNANT TUMORS HAVE BEEN REPORTED. WITH DRAWAL OF DRUG OFTEN RESULTS IN REGRESSION OR CESSATION OF PROGRESSION OF THE TUMOR. HOWEVER, HEPATIC TUMORS ASSOCIATED WITH ANDROGENS OR ANABOLIC STEROIDS ARE MUCH MORE VASCULAR THAN OTHER HEPATIC TUMORS AND MAY BE SILENT UNTIL LIFE-THREATENING INTRA-ABDOMINAL HEMORRHAGE DEVELOPS.

PELIOUSIS HEPATIS, A CONDITION ARE ALSO REPORTED IN WHICH LIVER AND SOMETIMES SPLENIC TISSUE IS REPLACED WITH BLOOD-FILLED CYSTS, HAS BEEN REPORTED IN PATIENTS RECEIVING ANDROGENIC ANABOLIC STEROID THERAPY. THESE CYSTS ARE SOMETIMES PRESENT WITH MINIMAL HEPATIC DYSFUNCTION, BUT AT OTHER TIMES THEY HAVE BEEN ASSOCIATED WITH LIVER FAILURE. THEY ARE OFTEN NOT RECOGNIZED UNTIL LIFE-THREATENING LIVER FAILURE OR INTRA-ABDOMINAL HEMORRHAGE DEVELOPS. WITHDRAWAL OF DRUG USUALLY RESULTS IN COMPLETE DISAPPEARANCE OF LESIONS.

BLOOD LIPID CHANGES THAT ARE KNOWN TO BE ASSOCIATED WITH INCREASED RISK OF ATHEROSCLEROSIS ARE SEEN IN PATIENTS TREATED WITH ANDROGENS AND ANABOLIC STEROIDS. THESE CHANGES INCLUDE DECREASED HIGH-DENSITY LIPOPROTEIN AND SOMETIMES INCREASED LOW-DENSITY LIPOPROTEIN. THE CHANGES MAY BE VERY MARKED AND COULD HAVE A SERIOUS IMPACT ON THE RISK OF ATHEROSCLEROSIS AND CORONARY ARTERY DISEASE.

### SIDE EFFECTS:

In many ways, Masteron® is a fairly side effect friendly anabolic steroid. Side effects of Masteron® use most certainly exist, but most men will find this steroid highly tolerable. As for females, virilization symptoms can be strong with this steroid, but we will also find they can be managed with the right plan. In order to understand the side effects of Masteron®, we have broken them down into their separate categories along with all you need to know.

**Estrogenic:** Masteron® does not aromatize and it does not carry any progestin nature making estrogenic side effects impossible with this steroid. This means gynecomastia and water retention will not be concerns. It also means high blood pressure that is sometimes caused by excess water retention will not be a concern. An anti-estrogen is not needed due to this steroid's use; as discussed it can have anti-estrogenic effects itself. However, depending on the specific cycle/stack that's implemented, an anti-estrogen may be needed.

**Androgenic:** The side effects of Masteron® can include those of an androgenic nature.

Androgenic side effects can include acne, accelerated hair loss in those predisposed to male pattern baldness and body hair growth. Thankfully this hormone carries a moderate level of total androgenic activity despite being a direct derivative of the potent androgen DHT. However, individual sensitivity will play a strong role, this steroid is well-known for greatly enhancing male pattern baldness in sensitive men far more than many anabolic steroids. An important note; the Drostanolone hormone is not metabolized by the 5-alpha reductase enzyme. This is the enzyme responsible for reducing testosterone to dihydrotestosterone. In the case of Masteron®, it's already DHT; there is no reduction. As there is no reduction, there is no metabolism and nothing to inhibit. This means the androgenic nature of Masteron will not be strongly affected by a 5-alpha reductase inhibitor such as Finasteride. Due to its androgenic nature, Masteron® can produce virilization symptoms in women. Virilization symptoms can include body hair growth, a deepening of the vocal chords and clitoral enlargement. Virilization symptoms have been well-noted in breast cancer treatment plans, but this is normally due to the necessary high doses used to treat such a condition. In a performance capacity, it should be possible to use this steroid without related symptoms with a low dose. However, while individual response will dictate quite a bit, this will not be a primary recommended steroid for female athletes. If it is used and related symptoms begin to show, discontinue use immediately and they will fade away. If the symptoms are ignored, it is very possible they may set in and become irreversible.

**Cardiovascular:** Masteron® can have a significant effect on cholesterol. This can result in an increase in LDL cholesterol, as well as a decrease in HDL cholesterol with the strongest emphasis on the latter. The total affect on cholesterol will not be as strong as often found in many oral steroids, specifically C17-alpha alkylated steroids. However, the total affect on cholesterol management will be stronger than compared to Nandrolone compounds or the testosterone hormone. It is also possible that Masteron® could have a slight negative impact on blood pressure, but this will be a non-issue for most. Due to the cholesterol effects of Drostanolone, cholesterol management becomes very important with this steroid. Far more important than with basic testosterone cycles or stacks including a basic 19-nor. If you already suffer from high cholesterol you should not use this anabolic steroid. If you are healthy enough for use, maintaining a cholesterol friendly lifestyle is very important. Not only does this mean a healthy diet, but it should be one that includes plenty of omega fatty acids, is limited in saturated fats as well as simple sugars. Plenty of cardiovascular activity is also advised.

**Testosterone:** Masteron® will significantly suppress natural testosterone production making exogenous testosterone therapy important when using this steroid. Failure to include exogenous testosterone will lead most men to a low testosterone condition, which not only comes with numerous possible symptoms but is also extremely unhealthy. As most will use Masteron® in a cutting cycle, it's very common not to want to use a lot of testosterone due to the high levels of estrogenic activity it can provide. If this is the case, you will find a low dose of 100-200mg per week of testosterone to be enough to combat suppression and give you the needed testosterone. Once Masteron® is discontinued and all exogenous steroidal hormones have cleared your system, natural testosterone production will begin again. Prior levels will not return to normal over night, this will take several months. Due to the slow recovery, Post Cycle Therapy (PCT) plans are often recommended. This will speed up the recovery greatly; however, it won't bring your levels back to their peak, this will still take time. A PCT plan will ensure you have enough testosterone for proper bodily function while your levels continue to naturally rise and significantly cut down on the total recovery time. This natural recovery does assume no prior low testosterone condition existed. It also assumes no damage was done to the Hypothalamic-Pituitary-Testicular-Axis (HPTA) through improper supplementation practices.

**Hepatotoxicity:** Masteron is not a hepatotoxic anabolic androgenic steroid and will present no stress or damage to the liver.

### PRECAUTIONS:

Elevated liver enzymes and in rare cases hepatic liver dysfunction may occur. Periodic liver function should be monitored for changes including serum bilirubin, AST, ALT, and AP.

Edema may be increased in patients on concurrent adrenal cortical steroid or ACTH therapy. Anabolic steroid hormones may increase low-density lipoproteins (LDL) and decrease high density lipoproteins (HDL). Lipids levels generally return to normal upon discontinuation of treatment.

Anabolic steroids may reduce clotting factors II, V, VII, and X, and may increase prothrombin time (PT). Patients should be instructed to report any use of warfarin and any irregular bleeding.

### PATIENT MONITORING:

Serum Cholesterol, HDL, LDL, TG, Hemoglobin and Hematocrit, Hepatic function tests - AST/ALT, Prostatic specific antigen - PSA, Testosterone: total, free, and bioavailable. Dihydrotestosterone & Estradiol

Male patients over 40 should undergo a digital rectal examination and evaluate PSA prior to androgen use.

Periodic evaluations of the prostate should continue while on androgen therapy, especially in patients with difficulty in urination or with changes in voiding habits.

### ADVERSE REACTIONS:

Male: Gynecomastia, excessive frequency and duration of penile erections, oligospermia.  
Skin and Appendages: Hirsutism, male pattern baldness and acne, gynecomastia.  
Fluid/electrolyte Disturbances: Retention of sodium, chloride, water, potassium, calcium, and inorganic phosphates.  
Gastrointestinal: Nausea, cholestatic jaundice, alterations in liver function tests; rarely, hepatocellular neoplasms, peliosis hepatitis, hepatic adenomas, and cholestatic hepatitis.  
Hematologic: Suppression of clotting factors II, V, VII, & X; bleeding in patients on anti-coagulant therapy.  
Nervous System: Changes in libido, aggression, headache, anxiety, depression, and generalized paresthesia.  
Metabolic: reduced glucose tolerance, increased creatinine clearance, and inhibition of gonadotrophin secretion.  
Other: Serum lipid changes, hypercalcaemia, hypertension, oedema, priapism, and potentiation of sleep apnea.

**OVERDOSAGE:**

There have been no reports of acute overdosage with the androgens.

**DOSAGE AND ADMINISTRATION:**

Adult male: 100 - 150mg injected IM every 3-5 days for duration of 4-8 weeks.

Body Building: Male 350 mg (100 mg every other days) –500 mg per week.  
Female 25-50 mg every other day to the third day.

**HOW SUPPLIED** – Masteron<sup>®</sup> Injection, Solution- Intramuscular-100 mg/ml is supplied in multiple dose 10 ml vial with green color flip cap.

For shelf-life please refer to the imprint on the pack.

Keep out of reach of children.

Should be at controlled room temperatures 15-30°C (59-86°F)

Do not freeze

This drug should be inspected visually for particulate matter and discoloration prior to administration, whenever solution and container permit. Warming and shaking the vial should redissolve any crystals that may have formed during storage at temperatures lower than recommended.

Protect from sun light

This drug has not been shown to be safe and effective for the enhancement of athletic performance!

**Manufactured and Distributed by: LA Pharma S.r.l.**

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