

KNOW YOUR NUMBERS AND TRENDS

Information is Empowering



As people with autoimmunity, we are predisposed to complications: some from the inflammation itself and some from medications used to reduce inflammation. Because of these risks, your doctor may request certain tests for you to closely monitor your health and side effects of medications. (Reviewed by multiple medical practitioners*)

WHAT CAN WE AS PATIENTS DO?

- Educate ourselves on the factors that have an impact on our health: sleep, nutrition, mind-body connection, movement, and medications.
- Work with our health care team to keep an eye on the following test results (listed below) at intervals as suggested by them, dependent on your disease and general health status, medications, and risk.
- “Know Your Numbers” (results of the tests) and watch for trends. Refer to the normal range of values provided by the lab and review them with your health care team to see what values are appropriate for you.
- Join patient groups like those listed below to learn more and get support.
 - * **CAPA (Canadian Arthritis Patient Alliance):** Helping patients living with arthritis find their voice www.arthritispatient.ca
 - * **Dragon Claw (Australian charity):** Encouraging self-care for those living with autoimmunity www.dragonclaw.net and Dragon Talks, a weekly meeting on zoom info@dragonclaw.net to register (free).



The table below outlines a list of blood tests with simple explanations. There is also a checklist at the end of this document that lists these tests that you can print and take to your appointment(s).

BLOOD WORK

1	FBC/CBC FULL BLOOD COUNT/ COMPLETE BLOOD COUNT	To ensure that our red blood cells (haemoglobin), white cells (infection fighters), and platelets (clotting helpers) are within a safe range.
2	INFLAMMATION MARKERS: C-REACTIVE PROTEIN (CRP) & ERYTHROCYTE SEDIMENTATION RATE (ESR)	These tests measure inflammation and may be an appropriate way to monitor your response to therapy. Controlling inflammation helps prevent long term complications such as cardiovascular (heart) disease, sarcopenia (loss of muscle mass), osteoporosis (loss of bone mass). Inflammatory markers may be raised for many different reasons.
3	HAEMOGLOBIN A1C (HBA1C)	This measures the average blood sugar over the past 3 months. A high HbA1C signals insulin resistance, prediabetes, or latent autoimmune diabetes (LADA).
4	CHOLESTEROLS AND TRIGLYCERIDES	As people with an autoimmune condition, we are predisposed to cardiac disease. Some medications raise cholesterol. Current guidelines advise a full risk assessment including waist circumference, BMI, lifestyle and family history of heart disease, diabetes and stroke rather than relying on cholesterol alone.
5	VITAMIN D	It is becoming evident that Vitamin D plays a role in many functions. Many of us are deficient in Vitamin D.
6	OTHERS	Your health team may also want to keep an eye on ferritin (iron storage), albumin, liver function tests (some medications can irritate the liver), and kidney function.



There are other values/tests to review regularly and they are described in the table below:

1	BLOOD PRESSURE	Chronic high blood pressure has ramifications throughout our bodies. Some medications may raise blood pressure which also trends upward with age.
2	BONE MINERAL DENSITY (BMD), DEXA SCAN	Inflammation, many medical conditions, early menopause and some medications can cause osteoporosis (bone loss) as can inactivity. Losing bone strength is “silent” until a fracture (break) occurs. There are medications and lifestyle changes that can help prevent osteoporosis and fractures.
3	EYE EXAMS	Glaucoma (increased pressure within the eye) is silent until damage is done. Our diseases and/or medications can affect eye health. Regular clinical eye exams, including photos of the back of the eye (retina) are recommended.
4	IMMUNISATIONS	Because our medications lower some aspects of our immune system, it is very important to keep all immunisations up to date. Check with your health care team and public health for up-to-date recommendations for all vaccinations.
5	WEIGHT	Keep tabs on your weight. Too high or too low is unhealthy. Work with a nutritionist/dietician if need be. Watch for trends upward or downward and intervene when necessary.
6	SKIN CHECK	Immune suppressants may leave us more at risk of skin cancers. Consider an annual skin cancer check.
7	IMAGING (XRAYs, SCANS) OF AFFECTED JOINTS	At times, it may be useful to have tests like X-rays and ultrasounds to assess your joints.

CHECKLIST

Here is the single sheet to print and take with you to your health care appointment. We have left room for you to make notes such as the appropriate range and frequency of testing for you. We did not include normal values as these may vary from country to country as the laboratories use different units of measure. Sometimes results may fall outside of the "normal range". You should discuss what is normal for you with your specialist and other health care team members.

BLOOD WORK

<input type="checkbox"/>	FBC/CBC Full Blood Count/ Complete Blood Count	Haemoglobin White blood count	Platelets
<input type="checkbox"/>	Inflammation markers	C-reactive protein (CRP) Erythrocyte Sedimentation (ESR)	
<input type="checkbox"/>	HbA1C Haemoglobin A1C		
<input type="checkbox"/>	Cholesterol and triglycerides	Cholesterol HDL cholesterol ("good") Non-HDL cholesterol	LDL cholesterol ("bad") Triglycerides
<input type="checkbox"/>	Vitamin D		
<input type="checkbox"/>	Liver (one or more may be chosen)	Alanine transaminase (ALT) Aspartate transaminase (AST) Alkaline phosphatase (ALP)	Gamma-glutamyltransferase (GGT) Lactate dehydrogenase (LD)
<input type="checkbox"/>	Kidney	Creatinine eGFR	Sodium Potassium

OTHER TESTS

<input type="checkbox"/>	Blood pressure
<input type="checkbox"/>	Bone Mineral Density via DEXA scan
<input type="checkbox"/>	Eye exams
<input type="checkbox"/>	Immunisations Consider using one of the apps to keep track of these: e.g. CANImmunise for Canadians or My Health Record app for Australians
<input type="checkbox"/>	Weight

DISCLAIMER:

This document does not replace the advice from your health care provider(s). We are patient organisations, run by patients and this is advice we have gleaned from our collective experiences. Please review with your health care provider(s).

* Reviewed Feb 2023 by [Medical Advisory Committee](https://arthritispatient.ca/about-us/) of CAPA <https://arthritispatient.ca/about-us/> and the following physicians for Dragon Claw:

- * [Dr Daniel Lewis](https://www.daniellewis.com.au/), rheumatologist, The Lewis Institute for Health & Wellbeing, Melbourne, AU.
- * Dr Peter Bell, lead Family Physician, Sharbot Lake Family Health Team, Ontario, Canada
- * Dr Barbara Schumacher, retired Medical Director, Campus Wellness, University of Waterloo, Ontario, Canada
- * Dr Kathleen Kett, family physician (retired)

Advice may change as medicine learns more and new medications are developed.

This resource has been developed by patient organisations using advice gleaned from patient experiences and is endorsed by **The Australian Rheumatology Association**. This resource is not meant to replace medical advice, please review with your health care providers.

