

## Fasting and Rheumatic Diseases

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### ABSTRACT

Fasting is one of the important religious practices of Muslims, in which the individuals abstain from eating and drinking from dawn to sunset. Fasting is not obligatory or even not allowed, in case it causes health problems to the fasting individual. Rheumatic diseases are a major group of chronic diseases which can bring about numerous problems while fasting. The aim of this article is to review the impact of Islamic fasting on rheumatic patients, based on the scientific evidence.

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### Introduction

Each year, as Ramadan month approaches, rheumatologists encounter a plethora of questions from rheumatic patients on the advantages and disadvantages of fasting. Some of these questions are mentioned below: "Can I fast?", "How does fasting affect my disease?", "Will fasting deteriorate my symptoms?" and "How should I use my medications in Ramadan?"

*"Provided that an individual is assured of adverse effects of fasting by his consultant physician or other rational sources, not only fasting is not obligatory but also it is prohibited"* (1). This is the religious authorities' response to the following query *"If a doctor bans a patient from fasting, is it obligatory to follow the advice?"*

We should bear in mind that the Quran provides us with plenty of advice on health maintenance (2); also, we shall not forget the fact that the purpose of Ramadan fasting is purification and worshiping God, and if this abstinence threatens the health of our organs, it is not accepted by God. In case of chronic diseases or special medical conditions, physician consultation on fasting is highly recommended before Ramadan or during the first days of this month.

According to the Islamic beliefs, fasting should be avoided if it causes any difficulties or leads to disease exacerbation or ailment (3). Thus, on the condition that fasting is not to the benefit of an individual, it is banned from the religious point of view, as well. However, by changing medications (such as using long acting medications), regulating diet and being aware of the disease symptoms, some patients can fast without any serious concerns.

Although the sick are exempt from fasting in Islam (4), the border between health and disease is not clear-cut. According to the current scientific evidence, the conditions for fasting exemption are not clearly specified; therefore, it is difficult to decide whether fasting is safe for some patients or not.

Although physicians decide on harmlessness of fasting, it is the patients who ultimately choose whether to fast or not. In that event, patients have a substantial role in decision making.

Given the scarcity of the controlled studies on the effect of Islamic fasting, in this study, we aim to answer some of the common questions regarding the effect of fasting on rheumatic patients, based on the following facts:

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1- Rheumatic diseases include a wide range of diseases causing a variety of problems (5). Therefore, we cannot give a general verdict on the effects of fasting on all of these diseases.

2- The causes and problems resulting from the rheumatic diseases are not alike (6). Thus, offering any comments on this issue, even in a single patient, should be based on the clinical and laboratory status of the patient.

3- Patients with rheumatic diseases are treated with various medicaments (7), which might influence physician's decision on fasting.

4- Some patients must take their medications regularly at certain times; it goes without saying that these patients must avoid fasting.

5- Reduction in the intake of calorie is beneficial for many rheumatic diseases (such as osteoarthritis and rheumatoid arthritis) (8). In case fasting causes calorie reduction in such diseases, it is recommended to the patients.

6- Severe mental and physical stress eventually leads to disease deterioration in most of rheumatic patients (9). In this regard, we can divide the patients into two groups as follows:

- Patients with severe stress for whom fasting can lead to disease exacerbation
- Patients becoming stressed due to feeling guilty of not fasting in Ramadan. In case there are no special prohibitions on fasting for these patients, they are allowed to fast.

7- Rheumatic diseases do not have the same clinical course (6). Accordingly, the decision making on fasting must be based on the present state of patients. A patient who was not able to fast the previous year, might be able to fast this year or vice versa.

8- If a physician is not able to make an accurate decision about the case, we often recommend patients to fast for a few days; then we evaluate the patients' condition and make an informed decision.

Moreover, offering an opinion on fasting for rheumatoid arthritis patients must be in accordance with the following conditions: Disease type, severity of the disease, the involved joints, test results, medications and their doses, the patient's psychological state and patients' beliefs.

### **Fasting in various rheumatic diseases** **Osteoarthritis (OA)**

Patients with osteoarthritis do not have

contraindications to fasting. Fasting entails decreased intake of calorie, which can be beneficial for the overweight patients (10).

### **Rheumatoid Arthritis (RA) and spondyloarthropathies**

Fasting in itself does not exacerbate symptoms; however, the following conditions must be taken into account: 1) Considering that dosing interval might get longer while fasting, it may aggravate pain, especially in the patients taking anti-inflammatory medications (steroidal and non-steroidal). 2) If fasting entails low consumption of calorie and saturated fat, it may alleviate pain (11).

### **Systemic Lupus Erythematosus, vasculitis, Behcet's disease and polymyositis-dermatomyositis**

Given the fact that these diseases have a wide variety of clinical manifestations (6, 12), a general verdict cannot be given to all patients; however, considering the following might be helpful:

- If the disease is severe and the patient is treated with high doses of various medicines, fasting might lead to disease worsening.
- Provided that low fluid intake exacerbates renal problems (12), fasting is harmful for these patients, especially in summer.
- As long as the patients do not suffer from stress, they can fast on the condition that the disease remains inactive using mild medications (e.g., Hydroxychloroquine and low-dose prednisone).

However, there are specific recommendations for particular rheumatoid diseases as follows:

- **Gout:** Given the fact that low fluids consumption exacerbates the attacks, fasting is not recommended to these patients, especially in summer.
- **Osteoporosis:** There is no fasting prohibition for these patients.
  - **Sjogren's syndrome:** Low fluid intake deteriorates mucosal dryness causing problems for the patients (14). Therefore, a proper decision must be based on the intensity and severity of the disease and the lacrimal and salivary gland dysfunction.
- **Scleroderma:** Considering the fact that in

this disease, the clinical symptoms are diverse and the intensity is variable, we cannot provide a general recommendation for all the patients. Although, a considerable number of patients have secondary Sjogren's syndrome (15), which was previously discussed.

- **Fibromyalgia:** Psychological disorders have an important role in development of this disease (16); thus, we can make the right decision considering patient's beliefs, and the amount of stress not-fasting can cause the patient. Sleep disorder is common in fibromyalgia patients (17), and changes in sleep pattern, might aggravate the symptoms. One way to alleviate stress is having faith and paying attention to spirituality. Patients with fibromyalgia may benefit from this month by improving their psychological well-being.

### Final recommendations to patients

1. Make sure you consult your physician on safety of fasting and your drug regimen.
2. In case you are overweight, seize the opportunity to reduce your caloric intake and to ease your symptoms (8).
3. Foods high in saturated fat may aggravate your symptoms (3), eat less of these foods as much as possible.
4. Dairy products, fruits and vegetables are beneficial to your health, do not forget to eat them.
5. If you are fasting, drink enough liquids during sunset to dawn.

Tranquility will help you to control your disease (9). Benefit from the spirituality of this month and avoid unnecessary stress, also be hopeful to future and have faith in God.

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