A cross-sectional study evaluating insulin injection techniques and the impact of instruction from various healthcare professionals on insulin users in southern region of Saudi Arabia

This article presents an in-depth analysis of insulin injection techniques, emphasizing their significance in the management of diabetes. The author effectively outlines various methods and best practices for insulin administration, underscoring the importance of proper technique in ensuring optimal therapeutic outcomes, which is appreciable. However, a few clarifications and revisions can improve the overall significance of the article.

1. Clarification of Insulin Timing (Line 161)

The statement in line 161 mentions that the "recommended injection time is 30 minutes after the meal." The article does not specify which insulin is being referenced. Given the variety of insulin formulations used in diabetes management, it is essential to differentiate between them in the context of meal timing.

A more precise reference would prevent confusion and enhance the accuracy of the information provided.

2. Discussion of Lipoatrophy (Line 273)

The article briefly touches on **lipohypertrophy**, a common complication associated with repeated insulin injections at the same site, but does not mention **lipoatrophy**, which is another potential complication of insulin therapy. While lipoatrophy is less common than lipohypertrophy, it still warrants attention, as it involves the loss of fat tissue at injection sites, which can affect insulin absorption and lead to variability in blood glucose control.

If lipoatrophy was not observed in the study population, it would be beneficial to mention this fact explicitly. Alternatively, the article could briefly discuss the condition and its potential impact on insulin absorption, emphasizing the importance of rotating injection sites to prevent both lipoatrophy and lipohypertrophy.

3. Use of Terminology (Line 294)

The term "insulin patients" is used in line 294, but it would be more appropriate to use "patients on insulin." The phrase "insulin patients" can be seen as stigmatizing or overly reductive, while "patients on insulin" conveys a more patient-centered and accurate description of individuals using insulin therapy. This small substitution would enhance the tone of the article and make it more aligned with contemporary, respectful language used in healthcare.

4. Typographical Error (Line 302)

In line 302, there is a typographical error: "restrics" should be corrected to "restricts."

5. Clarification of Insulin Pen Usage (Table 2)

The final question in **Table 2** asks, "How long do you use an insulin pen after first use?" Please clarify whether the question refers to **prefilled insulin pens** or **insulin cartridges**. Prefilled pens are designed for single use until the insulin is used up or till the expiry date, which is mostly by 28 days of usage. Insulin cartridges, on the other hand, are often part of reusable pens and may last longer,

depending on the patient's usage. While the cartridge needs to be replaced timely based on usage or the expiry date.

This distinction would ensure that the readers clearly understand the question and can answer it accurately based on their specific experience with insulin delivery devices.