

Review of: "Is There Any Reason to Stay in Human Genetic Societies as Cytogeneticists?"

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Potential competing interests: No potential competing interests to declare.

The paper highlights an important but under-discussed issue within Human Genetics: the marginalization of cytogenetics. Its critique of the field's overemphasis on DNA sequencing is timely, and its call to action deserves serious consideration. However, the arguments would be more compelling with additional data, broader geographic and methodological perspectives, and concrete, actionable solutions. By addressing these gaps, the paper could serve as a vital roadmap for revitalizing cytogenetics within Human Genetic societies. The author expresses a pressing concern regarding the diminishing representation of cytogenetics within Human Genetic societies over the past decade. The paper critiques the shift in focus toward DNA sequencing and gene mutation analysis while sidelining cytogenetics, molecular cytogenetics, and patient-centric components like family support groups. It warns of the potential dissolution of Human Genetic societies if this trend continues, as seen in countries where pathology has absorbed genetics. A draft letter is proposed as a call to action, urging societies to re-prioritize cytogenetics and chromosome-related research.

Suggestions for Improvement

1. Provide data on the decline in cytogenetics publications, conference sessions, or training programs to substantiate claims.
2. Include case studies highlighting the limitations of sequencing without cytogenetics.
3. Discuss how cytogenetics and sequencing can be integrated into a unified diagnostic framework.
4. Explore examples of societies or institutions successfully maintaining a balance between these methodologies.
5. Beyond the draft letter, propose specific strategies for re-integrating cytogenetics, such as targeted funding, dedicated conference tracks, or joint training programs with sequencing.
6. Examine regions where cytogenetics remains robust and analyze the factors contributing to its persistence.
7. Adopt a more solution-oriented tone and organize the paper into sections like *Background*, *Current Challenges*, *Consequences*, and *Recommendations*.