



## My take on innovation

Ashok N. Johari\*

Children's Orthopaedic Centre, Mumbai 400016, Maharashtra, India

\***Correspondence:** Ashok N. Johari, Children's Orthopaedic Centre, Mumbai 400016, Maharashtra, India. [drashokjohari@hotmail.com](mailto:drashokjohari@hotmail.com)

**Academic Editor:** Fernando Pérez-Ruiz, Cruces University Hospital, Spain

**Received:** November 2, 2025 **Accepted:** February 9, 2026 **Published:** March 29, 2026

**Cite this article:** Johari AN. My take on innovation. *Explor Musculoskeletal Dis.* 2026;4:1007120. <https://doi.org/10.37349/emd.2026.1007120>

What does innovation mean to me? What does the term 'innovation' signify? Are we all on the same page when talking about innovation?

The next questions relate to what is being innovated? Is it a product, a technique, a process, or the way of doing things?

How do we differentiate the terms—creative idea, invention, and innovation?

I recently came across an event called Innovation in Hip Arthroplasty: The Ultimate Solution and another named Robotic Knee Technology with Meaningful Innovation for Your Practice. Here, are we referring to a new product, technique, or process of arthroplasty that impacts the patient population and hence the community?

Creativity in any aspect of human endeavour generates an idea. We call it a creative idea. Such ideas come and go—surface, and further action may or may not be taken on them. Such ideas when subjected to a course that popularizes them, change shape into a product or a process. This product or process if repeatedly used creates a change in the practices of a community. This is called innovation ([Figure 1](#)).



**Figure 1. Idea versus innovation.**

An apple falling on Isaac Newton created an idea, that of the force of gravity. Gravity can be used in processes, e.g., a waterfall, to generate energy using hydroelectric dams. Using gravity to harness energy is definitely an innovation.

In this special issue on innovation, we take a look at innovations that have revolutionized the area of musculoskeletal disorders in general, with a review of what is happening in the arena of paediatric orthopaedics in particular. In this field, there have been many innovations—some are conceptual, some are biological or technological, and yet others are a result of collaborations at the meeting point of many disciplines.

© The Author(s) 2026. This is an Open Access article licensed under a Creative Commons Attribution 4.0 International License (<https://creativecommons.org/licenses/by/4.0/>), which permits unrestricted use, sharing, adaptation, distribution and reproduction in any medium or format, for any purpose, even commercially, as long as you give appropriate credit to the original author(s) and the source, provide a link to the Creative Commons license, and indicate if changes were made.



The widespread adoption of the Ponseti technique [1] typifies the fate of many innovations that are revolutionary and subjected to ridicule to start with. This is because of the fear and lack of acceptance of what is perceived as a radical change. With perseverance and demonstration of better results, less morbidity, and cost effectiveness, the tide turns in its favour towards gradual and then rapid adoption. Ponseti, as an ideal example of an innovator, was curious, wanting to change the status quo, was perseverant and persistent with his method, obsessed to a point in proving its usefulness, leading to an epic change in the status quo.

Safe surgical dislocation of the hip [2] and the use of the extended retinacular flap are probably examples of incremental biological innovations brought about by curiosity and continual experimentation in improving the results of complex surgery for the hip.

Another example of a biological innovation is botulinum toxin. Its application in the field of medicine is an example of serendipity. The extended application of knowledge helped its use for spasticity [3].

Instrumented gait analysis [4] demonstrates the importance of communication and collaboration for innovation. It is an example of collaboration between disciplines to be able to devise objective evaluation, treatment recommendations, and prognostication in gait and other disorders.

There are many examples that follow in this paper [5]. They are all examples of technological innovations that are being used to solve day-to-day problems in paediatric orthopaedics. Examples are the six-axis external fixator, motorized internal limb lengthening, magnetic rods used for elongation of the growing spine, etc.

Are future innovations going to be conceptual, will they exploit biology, or will they be technology-based? Progress is multidirectional! Because of the thrust on technology and industry involvement, it seems that technological progress happens faster, but this is difficult to predict. It will be prudent to say that innovations are a search for the 'better', a striving for excellence in a human endeavour, and innovations will continue to happen as long as humans exist.

## **Declarations**

### **Author contributions**

ANJ: Writing—original draft, Writing—review & editing. The author read and approved the submitted version.

### **Conflicts of interest**

Ashok N. Johari, who is the Associate Editor and Guest Editor of Exploration of Musculoskeletal Diseases, had no involvement in the decision-making or the review process of this manuscript.

### **Ethical approval**

Not applicable.

### **Consent to participate**

Not applicable.

### **Consent to publication**

Not applicable.

### **Availability of data and materials**

Not applicable.

### **Funding**

Not applicable.

## Copyright

© The Author(s) 2026.

## Publisher's note

Open Exploration maintains a neutral stance on jurisdictional claims in published institutional affiliations and maps. All opinions expressed in this article are the personal views of the author(s) and do not represent the stance of the editorial team or the publisher.

## References

1. Ponseti IV. *Congenital Clubfoot: Fundamentals of Treatment*. Oxford University Press; 1996.
2. Ganz R, Gill TJ, Gautier E, Ganz K, Krügel N, Berlemann U. Surgical dislocation of the adult hip a technique with full access to the femoral head and acetabulum without the risk of avascular necrosis. *J Bone Joint Surg Br*. 2001;83:1119–24. [DOI] [PubMed]
3. Koman LA, Mooney JF 3rd, Smith B, Goodman A, Mulvaney T. Management of cerebral palsy with botulinum-A toxin: preliminary investigation. *J Pediatr Orthop*. 1993;13:489–95. [DOI] [PubMed]
4. Sutherland DH. The evolution of clinical gait analysis. Part II kinematics. *Gait Posture*. 2002;16:159–79. [DOI] [PubMed]
5. Johari AN, Pandey RA. Paediatric orthopaedics is changing—the significant innovations in recent years! *Explor Musculoskeletal Dis*. 2026;4:1007119. [DOI]