# MI-COD

MSS INDIA- Case Of the Day

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INDIA

OSKELETA

Case contributor Dr. Praveen Kumar Chinniah Musculoskeletal Society of India (MSS) & Indian Journal of Musculoskeletal Radiology (IJMSR), the official publication of MSS India

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## Osteopetrorickets



Extensive medullary sclerosis with bone within bone appearance, metaphyseal cupping, fraying, splaying and hepatosplenomegaly

## Osteopetrorickets

# THE PARADOX OF PLENTY

#### Scarcity despite wealth!



https://themoneyengineers.com/2024/05/27/the-paradox-of-plenty/

# Osteopetrorickets



- Rickets is a common and paradoxical feature of infantile malignant osteopetrosis and results from the inability of osteoclasts to maintain a normal calcium-phosphorus balance in the extracellular fluid.
- Despite a markedly positive total body calcium balance, rickets arises when the serum calcium x phosphorus product is insufficient to mineralize newly formed chondroid and osteoid.
- Skeletal survey & serial monitoring important in infants with hypophosphatemia & failure to thrive
- Important to diagnose and manage rickets & sequelae of secondary hyperparathyroidism, even in cases where the bones are dense.

Kaplan FS, August CS, Fallon MD, Gannon F, Haddad JG. Osteopetrorickets. The paradox of plenty. Pathophysiology and treatment. Clin Orthop Relat Res. 1993 Sep & Kirubakaran C, Ranjini K, Scott JX, Basker M, Sridhar G. Osteopetrorickets. J Trop Pediatr. 2004 Jun