



60 year old smoker, insidious onset of pain in the right thumb of 6 wks duration

?Diagnosis

Diagnosis: Acrometastases

Abstract Metastases distal to the elbow and the knee (acrometastases) are rare, [0.1 % of all cases.]

Acrometastases can appear in patients of every age, with men being twice as likely as women to be affected.

The most common primary cancer site is the lung (50 %), followed by the colon, breast and genito-urinary tract.

They mainly appear in cancer patients with widespread disseminated disease.

Rarely, they may be the first presentation of occult silent cancer, mimicking a benign condition.

The rare incidence of foot acrometastases is believed to be due to the lack of red marrow in these bones, a further distance from the primary cancer site, and the valveless paravertebral venous plexuses (Batson's plexuses), which allow retrograde tumor cell embolization through the iliofemoral venous system.

Treatment depends on staging and tumor extent. Amputative surgery is the more common approach, especially for cancers with poor response to radiation therapy and chemotherapy.

In the majority of cases, disarticulation of the ray is required to achieve wide margin resection.

If unresectable, palliative treatment with radiation therapy, bisphosphonates and chemotherapy is recommended.

The prognosis of the patients with acrometastatic cancer is poor; the mean survival time after diagnosis is 6 months. An exception seems to be the patients with renal cell carcinoma, if treated with radical surgical resection, and a long latency period between nephrectomy and metastasis has occurred.

Prognosis

In general, the prognosis of the patients with acrometastatic cancer is poor; the mean survival time after diagnosis is 6 months [3]. A statistically significant difference in the survival of the patients according to the different sites and number of the acrometastasis, the age of the patients or the histology of the primary cancer has not been observed [4, 18]. An exception seems to be the patients with renal cell carcinoma. These patients seem to have a better

prognosis, with survival exceeding 1 year if treated with aggressive radical surgical resection, particularly if there is a long latency period between nephrectomy and metastasis [25, 29–31].

Conclusion

Acrometastases are rare, but as cancer treatments improve and life expectancy increases, they may become more prevalent. The most common primary cancer is the lung for acrometastases of the hand and subdiaphragmatic cancers for acrometastases of the foot. Treatment depends on staging and tumor extent. Amputative surgery is the more common approach, especially for cancers with poor response to radiation therapy and chemotherapy. The prognosis is poor.

References

1. Eur J Orthop Surg Traumatol (2014) 24:279–283
- 2.. Curr Oncol 15(5):51–58
3. J Bone Joint Surg Am 68:743–746