# Molecular Cancer Research

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Osteosarcoma is the most common primary bone malignancy in children and young adults and accounts for over 50% of primary skeletal malignancies. Previous reports have demonstrated that expression of VEGF/VEGF-R1 in human osteosarcoma is associated with an aggressive clinical course. Angiographies of K7M3 osteosarcoma-injected murine tibias immunoselected for either VEGF-R1-low expression (Low) or VEGF-R1-high expression (High) compared to contralateral limb (Control) demonstrate that high levels of VEGF-R1 are associated with increased tumor growth and tumor angiogenesis. These results strongly suggest that autocrine VEGF-R1 signaling in a relatively small subpopulation of tumor plays a pivotal role in osteosarcoma progression. These findings may lead to improved stratification of high-risk osteosarcoma and novel strategies for anti-neoplastic therapy based on the inhibition of angiogenesis in this specific tumor type. For more information, see the article by Ohba and colleagues, beginning on page 1100 in this issue.