# NORMALIZATION

Given the fact that the accessibility of a drug to its target site, the tumor cell, is one of the major problems in chemotherapy and as the tumor vasculature has a unique phenotype, it makes sense to promote a better delivery of chemotherapy by using these vascular properties. The combination of a vasoactive agent and conventional chemotherapy resulted in improved tumor responses and quality of life in patients with multiple in-transit melanoma or soft tissue sarcomas. The success of this combination led to a more detailed investigation into this complex mechanism.

The concept of tumor vessel abnormalization promotes the idea that further improving the already abnormal characteristics of the tumor-associated vasculature augments the bioavailability of cytotoxic agents. This approach can find its match with the already established antiangiogenesis and vascular destructive cancer therapies. This thesis is the result of six years of research into this topic and

- -introduces the concept of tumor vessel abnormalization
- -shows detailed information of the exact location of chemotherapy
- -addresses the benefit of dual targeting
- -finds a new target in the tumor-associated vasculature

This thesis also provides opportunities for further investigation into this topic and is a must read

Ann S eynhaeve

## Abnormalization of tumor vessels to improve the efficacy of chemotherapy

**Ann Seynhaeve** 



Killing tumors by improving vascular abnormalities

Pericytes, the target cells of TNF

The importance of dual targeting

How promising is Cilengitide?