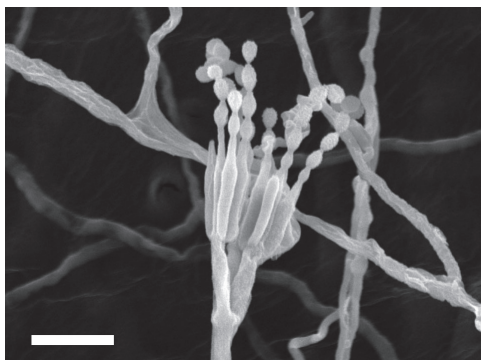


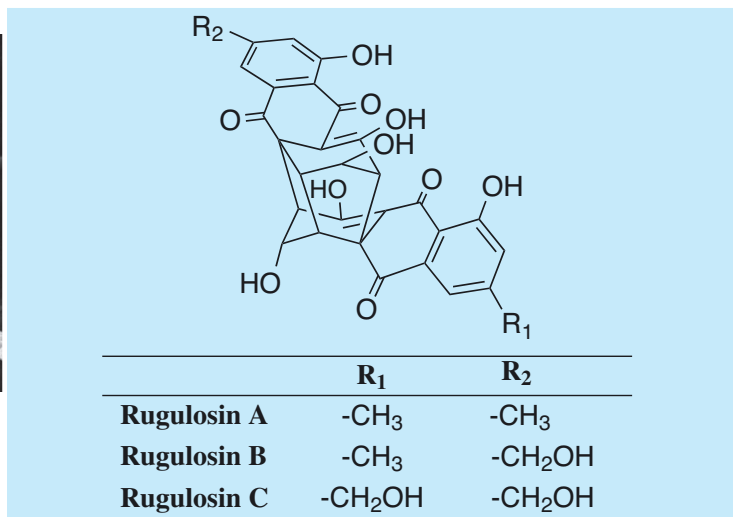
Rugulosin

1. Discovery, producing organism and structure¹⁾

Rugulosins B and C were isolated from a culture broth of *Penicillium radicum* (current name: *Talaromyces radicus*) FKI-3765-2 and proved to be anti-MRSA agents. FKI-3765-2 is also a producer of xanthoradones. Rugulosins B and C are analogs of rugulosin A (renamed from rugulosin) having anthraquinone dimers.



Penicillium radicum FKI-3765-2
(*Talaromyces radicus* FKI-3765-2)
Bar: 10 μ m



2. Physical data (Rugulosin B)

Yellow crystal. C₃₀H₂₂O₁₁; mol wt 558.49. Sol. in DMSO.

3. Biological activity¹⁾

1) Anti-MRSA activity

Rugulosin A showed potent anti-MRSA activity with a MIC value of 0.125 μ g/mL, while rugulosins B and C showed weak activity with MIC values of 32 and 64 μ g/mL, respectively.

2) Cytotoxicity

No cytotoxicity against Jurkat cells were observed even at 60-100 μ g/mL of rugulosins.

4. References

- [1082] H. Yamazaki *et al.*, *Org. Lett.* **12**, 1572-1575 (2010)