

Pine heartwood against the flu?*

Objective

Is the pine heartwood extract effective against the influenza A virus?

Procedure

In This study investigated the effect of the pine heartwood extract on the replication of influenza viruses. In particular, the effect on the human virus isolate A/Puerto-Rico/8/34 (PR8) and the highly pathogenic avian bird influenza virus A/virus/Bratislava/79 (FPV) in different host cells, specifically in dog kidney epithelial cells (Madin-Darby canine kidney cells (MDCK)) as well as A549 lung epithelial cells in vitro.



Results

It was shown that the Virustiter infectious PR8 after an incubation of the infected MDCK cells with a non-cytotoxic concentrations of the extract 25% (v / v) compared to untreated cells to 100% **and the Virustiter of infectious FPV to 90% has been reduced.**

Conclusion

The antiviral effect of the pine extract or purified compounds could possibly be a therapy against drug-resistant influenza viruses and provide an alternative for flu patients.



Implementation

Prof. Dr. rer. nat. Stephan Ludwig,
Institute for Molecular Virology,
Center for Molecular Biology of Inflammation (ZMBE)
Von-Esmarch-Str. 56, D-48149 Münster, 2006.

* Data: Institute for Molecular Virology (2006): Investigation on assignments project, Investigation of aqueous excerpts from Pine heartwood and their effect on increase of influenza A viruses

