

Federal Service for Supervision of Consumer Rights Protection and Human Welfare
Federal Budgetary Institution of Science "Federal Scientific Center of Hygiene named after
F.F. Erisman"
Institute of Disinfectology

APPROVED

Director of the Federal Budgetary Scientific Institution
"FSCH of F.F. Erisman" Rospotrebnadzor, Doctor of
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REPORT

ABOUT THE PERFORMANCE OF RESEARCH WORK "Toxicological studies of the product
"ZnO/Ag NP Concentrate" produced by NI TSU, Russia, antimicrobial, antiviral, antifungal
paint and varnish material with the addition of nanoparticle concentrate (LKM and LKS)
produced by JSC "Association "Yaroslavskie Paints", Russia"

(Final)

Head of research work, head. Department of Toxicology,
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M.V. Bidevkina

CONCLUSION

The toxicological characteristics of the studied samples are summarized in Table 4.

Table 4. Toxicometry parameters of the studied samples.

Toxicometry parameters	Samples studied		
	Concentrate of ZnO /Ag NPs	LMB	LKS
DL ₅₀ , i.v., mice	> 5000	> 5000	> 5000
Degree of volatility, C ⁷⁰	No changes in recorded indicators	No changes in recorded indicators	No changes in recorded indicators
Irritant to skin	Doesn't irritate	Doesn't irritate	Doesn't irritate
Sensitizing effect	Not found	Not found	Not found

As follows from the data presented, the studied samples (ZnO / Ag NP Concentrate , LKM, LKS) in terms of LB₅₀, when administered intragastrically, belong to the 4th class of low-hazardous substances according to GOST 12.1.007-26, in terms of volatility they belong to the 4th class of low-hazardous substances According to the classification of chemical substances, when applied once to the skin, they do not cause irritation and do not have a sensitizing effect.




The content of silver and zinc oxide nanoparticles after treating the surfaces in the premises with paints and varnishes indicates the safety of people in these premises.

Report personnel

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