

Centre For AIDS Reagents

Data Sheet

NAME:	Zidovudine
REPOSITORY REFERENCE:	ARP982
DESCRIPTION:	Zidovudine is a nucleoside analogue of the naturally occurring nucleoside, thymidine. Zidovudine is converted to zidovudine 5'-triphosphate by cellular enzymes. Zidovudine 5'-triphosphate inhibits the activity of the HIV-1 reverse transcriptase by competing with utilization of natural substrate, deoxythymidine 5'-triphosphate and by its incorporation into viral DNA. The lack of 3'-OH group in the incorporated nucleoside analogue prevents the formation of the 5' to 3' phosphodiester linkage essential for DNA chain elongation. Zidovudine 5'-triphosphate is also a weak inhibitor of cellular DNA polymerase and mitochondrial polymerase.
PRESENTATION:	25 mg
SOLUBILITY:	Soluble in ethanol, relatively soluble in water
CHEMICAL NAME:	3'-azido-3'-deoxythymidine
MOLECULAR FORMULA:	C ₁₀ H ₁₃ N ₅ O ₄
MOLECULAR WEIGHT:	267.24
STORAGE:	Room temperature, cool, dark, dry.
SOURCE:	Sequoia Research Products.
ACKNOWLEDGEMENT:	Publications should acknowledge the donor of the reagent and the Programme EVA Centre for AIDS Reagents. Suggested wording can be found on our website at http://www.nibsc.ac.uk/spotlight/aidsreagent/index.html in the "Acknowledgements" section. Please also ensure that you send us a copy of any papers resulting from work using reagents acquired through CFAR (this can be Electronically or as a paper copy)