

Abbreviations

Abbreviation	Full Form
<i>ABC</i>	ATP binding cassette
<i>ABCB1</i>	ATP binding cassette B1 family
<i>ACI</i>	Andersen cascade impactor
<i>AFM</i>	Atomic force microscopy
<i>ANOVA</i>	Analysis of variance
<i>ATCC</i>	American Type Culture Collection
<i>AUC</i>	Area under the curve
<i>AUMC</i>	First moment of plasma concentration-time curve
<i>BALF</i>	Broncho alveolar lavage fluid
<i>BBD</i>	Box behnken design
<i>BOD incubator</i>	Bio-Oxygen Demand incubator
<i>bp</i>	Basepair
<i>BSA</i>	Bovine Serum Albumin
<i>CPCSEA</i>	Committee for the purpose of control and supervision of experiments
<i>D-PLHNCs</i>	Docetaxel loaded polymeric lipid hybrid nanocarriers
<i>D-sh-PLHNCs</i>	Docetaxel and shRNA loaded polymeric lipid hybrid nanocarriers
<i>DAPI</i>	4',6-diamidino-2-phenylindole
<i>DEPC</i>	Diethyl polycarbonate
<i>DMEM</i>	Dulbecco's minimum essential medium with Earls salt
<i>DOPE</i>	Dioleoyl phosphatidyl ethanolamine
<i>DOTAP</i>	N-[1-(2,3-dioleyloxy)propyl]-N,N,N-trimethylammonium chloride (DOTMA) , [1,2-bis(oleoyloxy)-3-(trimethylammonio)propane]
<i>DPI</i>	Dry Powder for Inhalation
<i>DPPC</i>	Dipalmitoyl phosphatidylcholine
<i>DR-A549</i>	Docetaxel resistant A549 cell line
<i>DSC</i>	Differential Scanning Calorimetry
<i>DSPE</i>	1,2-Distearoyl-sn-glycero-3-phosphoethanolamine
<i>DSPE-</i> <i>mPEG2000</i>	2-distearoyl-sn-glycero-3-phosphoethanolamine [methoxy (polyethyleneglycol)- (polyethyleneglycol)-2000]
<i>dsRNA</i>	double-stranded RNA
<i>ED</i>	Emitted dose
<i>EDTA</i>	Ethylene Diamine Tetraacetic Acid
<i>EtBr</i>	Ethidium bromide
<i>Fab</i>	Antigen-binding fragments
<i>FACS</i>	Fluorescence activated cell sorting
<i>FA-D-sh-PLHNCs-</i>	Folic acid conjugated Docetaxel and shRNA loaded polymeric lipid hybrid nanocarriers
<i>FBS</i>	Fetal Bovine Serum

<i>FITC</i>	Fluorescein Isothiocyanate
<i>FITC-NC-siRNA</i>	Fluorescein Isothiocyanate labelled negative control silencing RNA
<i>FPF</i>	Fine particle fraction
<i>FT-IR</i>	Fourier transform infrared spectroscopy
<i>G/C</i>	Guanine/cytosine
<i>GSD</i>	Geometric standard deviation
<i>IAEC</i>	Institutional Animal Ethical Committee
<i>IC₅₀</i>	Inhibitory concentration 50
<i>ICH</i>	International conference on harmonization
<i>KBr</i>	Potassium bromide
<i>kDA</i>	Kilo Dalton
<i>L2K</i>	Lipofectamine2000
<i>LDH</i>	Lactate dehydrogenase
<i>LOD</i>	Limit of Detection
<i>LOQ</i>	Limit of Quantification
<i>LPHNPs</i>	Lipid-polymeric hybrid Nanoparticles
<i>LSCM</i>	Laser scanning confocal microscope
<i>mCGE</i>	Multiple capillary gel electrophoresis
<i>MLV</i>	Multilamellar vesicles
<i>MMAD</i>	Mean mass aerodynamic diameter
<i>MRT</i>	Mean residence time
<i>MTD</i>	Maximum Tolerated Dose
<i>MTT</i>	3-(4,5-dimethylthiazol-2-yl)-2,5-diphenyl tetrazolium bromide
<i>NFW</i>	Nuclease free water
<i>PBS</i>	Phosphate Buffer Saline
<i>PEG-PCL</i>	Polyethylene glycol- Polycaprolactone
<i>PDI</i>	Polydispersity index
<i>P-gp</i>	P-glycoprotein
<i>PLGA</i>	Poly lactic glycolic acid
<i>PLHNCs</i>	Polymeric lipid hybrid nanocarriers
<i>PXRD</i>	Powder X-ray diffraction
<i>RES</i>	Reticulo-endothelial system
<i>RNA</i>	Ribose nucleic acid
<i>RNAi</i>	RNA interference
<i>RP-HPLC</i>	Reverse-phase high performance liquid chromatography
<i>RSD</i>	Relative Standard deviation
<i>RT</i>	Room temperature
<i>SEM</i>	Scanning electron microscopy
<i>TEM</i>	Transmission electron microscopy