

**NIPER M. S. Pharm**

**Batch 2022-2024**

**Timetable for common practical- Semester I**

**G1: Pharmaceutics, Pharmacology**

**G2: Biotechnology, Medical Devices, Natural Products**

**G3: Pharmaceutical Analysis, Medicinal Chemistry**

<b>05-09-22</b>				<b>06-09-22</b>			
<b>Group</b>	<b>Experiment</b>	<b>Lab</b>	<b>Faculty</b>	<b>Group</b>	<b>Experiment</b>	<b>Lab</b>	<b>Faculty</b>
G1	Calibration of micropipette	DD	RR	G2	Calibration of micropipette	DD	RR
G2	Calibration of the graduated pipette	MS	AMS	G3	Calibration of the graduated pipette	MS	AMS
G3	Calibration of pH meter	DD	NS	G1	Calibration of pH meter	DD	NS

<b>07-09-22</b>			
<b>Group</b>	<b>Experiment</b>	<b>Lab</b>	<b>Faculty</b>
G3	Calibration of micropipette	DD	RR
G1	Calibration of the graduated pipette	MS	AMS
G2	Calibration of pH meter	DD	NS

**G1: Pharmaceutics, Pharmacology**

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08-09-22				09-09-22			
Group	Experiment	Lab	Faculty	Group	Experiment	Lab	Faculty
G1	Plotting the calibration curve of given drug through UV-visible spectrophotometer	DD	PS	G2	Plotting the calibration curve of given drug through UV-visible spectrophotometer	DD	PS
G2	Preparation of the TLC plate	MS	SS	G3	Preparation of the TLC plate	MS	SS
G3	Determination of the hardness, friability and weight variation of given tablet	DD	AJ	G1	Determination of the hardness, friability and weight variation of given tablet	DD	AJ

12-09-22			
Group	Experiment	Lab	Faculty
G3	Plotting the calibration curve of given drug through UV-visible spectrophotometer	DD	PS
G1	Preparation of the TLC plate	MS	SS
G2	Determination of the hardness, friability and weight variation of given tablet	DD	AJ

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13-09-22				14-09-22			
Group	Experiment	Lab	Faculty	Group	Experiment	Lab	Faculty
G1	Standard operating procedure and demonstration of Rotavapor	MS	AMS	G2	Standard operating procedure and demonstration of Rotavapor	MS	AMS
G2	Isolation and purification of the reaction mixture by column chromatography	MS	SC	G3	Isolation and purification of the reaction mixture by column chromatography	MS	SC
G3	Determination of the "Q value" of a given tablet formulation using dissolution apparatus	DD	DB	G1	Determination of the "Q value" of a given tablet formulation using dissolution apparatus	DD	DB

15-09-22			
Group	Experiment	Lab	Faculty
G3	Standard operating procedure and demonstration of Rotavapor	MS	AMS
G1	Isolation and purification of the reaction mixture by column chromatography	MS	SC
G2	Determination of the "Q value" of a given tablet formulation using dissolution apparatus	DD	DB

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16-09-22				19-09-22			
Groups	Experiment	Lab	Faculty	Groups	Experiment	Lab	Faculty
G1	Calibration of UV-Vis spectrophotometer	DD	AK	G1	Calibration of UV-Vis spectrophotometer	DD	AK
G2	Isolation of plasmid DNA using alkaline lysis method	MS	AMM	G2	Isolation of plasmid DNA using alkaline lysis method	MS	AMM
G3	Preparation and characterization of chitosan nanoparticles as a drug delivery system of diclofenac sodium	DD	RT	G3	Preparation and characterization of chitosan nanoparticles as a drug delivery system of diclofenac sodium	DD	RT

20-09-22			
Groups	Experiment	Lab	Faculty
G1	Isolation of plasmid DNA using alkaline lysis method	MS	AMM
G2	Preparation and characterization of chitosan nanoparticles as a drug delivery system of diclofenac sodium	DD	RT
G3	Calibration of UV-Vis spectrophotometer	DD	AK

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21-09-22				22-09-22			
Groups	Experiment	Lab	Faculty	Groups	Experiment	Lab	Faculty
G1	Isolation of plasmid DNA using alkaline lysis method	MS	AMM	G1	Preparation and characterization of chitosan nanoparticles as a drug delivery system of diclofenac sodium	DD	RT
G2	Preparation and characterization of chitosan nanoparticles as a drug delivery system of diclofenac sodium	DD	RT	G2	Calibration of UV-Vis spectrophotometer	DD	AK
G3	Calibration of UV-Vis spectrophotometer	DD	AK	G3	Isolation of plasmid DNA using alkaline lysis method	MS	AMM

23-09-22			
Groups	Experiment	Lab	Faculty
G1	Preparation and characterization of chitosan nanoparticles as a drug delivery system of diclofenac sodium	DD	RT
G2	Calibration of UV-Vis spectrophotometer	DD	AK
G3	Isolation of plasmid DNA using alkaline lysis method	MS	AMM

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**G3: Pharmaceutical Analysis, Medicinal Chemistry**

26-09-22				27-09-22			
Group	Experiment	Lab	Faculty	Group	Experiment	Lab	Faculty
G1	Introduction of laboratory animals and CPCSEA guidelines	MS/ Auditorium	PB	G2	Introduction of laboratory animals and CPCSEA guidelines	MS/ Auditorium	PB
G2	Laboratory animal handling and study of different routes of administration in rats and mice	MS/ SR-I	HK	G3	Laboratory animal handling and study of different routes of administration in rats and mice	MS/ SR-I	HK
G3	Determination of the effect of fines (%), lubricant and glidant on the bulk density and tapped density of given powder and granule sample	DD	DB	G1	Determination of the effect of fines (%), lubricant and glidant on the bulk density and tapped density of given powder and granule sample	DD	DB

28-09-22			
Group	Experiment	Lab	Faculty
G3	Introduction of laboratory animals and CPCSEA guidelines	MS/ Auditorium	PB
G1	Laboratory animal handling and study of different routes of administration in rats and mice	MS/ SR-I	HK
G2	Determination of the effect of fines (%), lubricant and glidant on the bulk density and tapped density of given powder and granule sample	DD	DB

**G1: Pharmaceutics, Pharmacology**

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29-09-22				30-09-22			
Groups	Experiment	Lab	Faculty	Groups	Experiment	Lab	Faculty
G1	Determination of the pKa value of given drug substance through UV spectrophotometric method	DD	NS	G1	Determination of the pKa value of given drug substance through UV spectrophotometric method	DD	NS
G2	Spectral Analysis	MS	DK	G2	Spectral Analysis	MS	DK
G3	Determination of the effect of fines (%), lubricant and glidant on the angle of repose of given sample	DD	AJ	G3	Laboratory animal handling and study of different routes of administration in rats and mice	MS	HK

03-10-22			
Groups	Experiment	Lab	Faculty
G1	Spectral Analysis	MS	DK
G2	Determination of the effect of fines (%), lubricant and glidant on the angle of repose of given sample	DD	AJ
G3	Determination of the pKa value of given drug substance through UV spectrophotometric method	DD	NS

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04-10-22				06-10-22			
Groups	Experiment	Lab	Faculty	Groups	Experiment	Lab	Faculty
G1	Spectral Analysis	MS	DK	G1	Determination of the effect of fines (%), lubricant and glidant on the angle of repose of given sample	DD	AJ
G2	Laboratory animal handling and study of different routes of administration in rats and mice	MS	HK	G2	Determination of the pKa value of given drug substance through UV spectrophotometric method	DD	NS
G3	Determination of the pKa value of given drug substance through UV spectrophotometric method	DD	NS	G3	Spectral Analysis	MS	DK

07-10-22			
Groups	Experiment	Lab	Faculty
G1	Laboratory animal handling and study of different routes of administration in rats and mice	MS	HK
G2	Determination of the pKa value of given drug substance through UV spectrophotometric method	DD	NS
G3	Spectral Analysis	MS	DK



**G1: Pharmaceutics, Pharmacology**

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<b>10-10-2022 to 28-10-2022</b>			
<b>Groups</b>	<b>Experiment</b>	<b>Lab</b>	<b>Faculty</b>
<b>G1</b>	<b>Computer practical</b>	<b>Auditorium</b>	<b>SB</b>
<b>G2</b>	<b>Computer practical</b>	<b>Auditorium</b>	<b>SB</b>
<b>G3</b>	<b>Computer practical</b>	<b>Auditorium</b>	<b>SB</b>

**G1: Pharmaceutics, Pharmacology, Pharmaceutical Analysis****G2: Biotechnology, Medical Devices, Natural Products, Medicinal Chemistry**

07-11-22				09-11-22			
Groups	Experiment	Lab	Faculty	Groups	Experiment	Lab	Faculty
G1	Demonstration of analytical instruments (HPLC, semi- preparative HPLC)	CIF	PS	G2	Demonstration of analytical instruments (HPLC, semi- preparative HPLC)	CIF	PS
G2	Demonstration of analytical instruments (DSC, TGA)	CIF	DB	G1	Demonstration of analytical instruments (DSC, TGA)	CIF	DB

10-11-22				11-11-22			
Groups	Experiment	Lab	Faculty	Groups	Experiment	Lab	Faculty
G1	Demonstration of analytical instruments (GPC)	CIF	NS	G2	Demonstration of analytical instruments (GPC)	CIF	NS
G2	Demonstration of analytical instruments (LC-MS)	CIF-2	RR	G1	Demonstration of analytical instruments (LC-MS)	CIF-2	RR

14-11-22				15-11-22			
Groups	Experiment	Lab	Faculty	Groups	Experiment	Lab	Faculty
G1	Demonstration of analytical instruments (GC)	CIF	RVT	G2	Demonstration of analytical instruments (GC)	CIF	RVT
G2	Demonstration of analytical instruments (FTIR, ATR)	CIF	RR	G1	Demonstration of analytical instruments (FTIR, ATR)	CIF	RR
16-11-22				17-11-22			
Groups	Experiment	Lab	Faculty	Groups	Experiment	Lab	Faculty
G1	Demonstration of analytical instruments (LC-MS)	CIF	RR	G2	Demonstration of analytical instruments (LC-MS)	CIF	RR
G2	Demonstration of analytical instruments (Polarimeter)	CIF	NS	G1	Demonstration of analytical instruments (Polarimeter)	CIF	NS

Practical schedule from 18-11-2022 onwards: Respective department.