



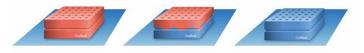
Corning[®] CoolRack[®] Modules

Corning CoolRack thermo-conductive metal alloy tube modules reduce variability which originates from tubes or wells placed directly into ice, dry ice, alcohol baths, water baths, and other temperature sources.



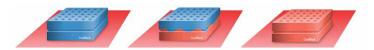
How It Works

Cooling



Corning CoolRack on ice. Heat from the warmer Corning CoolRack module is transferred to a cooling source (wet or dry ice, cartridge, LN2) until equilibrium is reached.

Warming

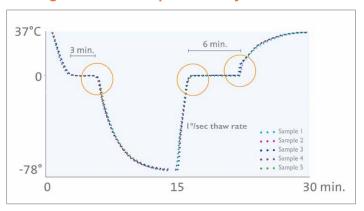


Corning CoolRack in water bath. Heat is transferred from water bath toward cooler Corning CoolRack until equilibrium is reached.

Corning CoolRack and Corning CoolSink® are precision-engineered sample modules manufactured from a novel thermo-conductive alloy material. Thermo-conductivity is the transfer of heat energy from a higher temperature region to a lower temperature region. CoolRack modules evenly distribute the temperature across all wells providing very uniform and consistent temperature to all samples (±0.1°C).



Corning® CoolRack® Reproducibility



Thermo-conductive Modules Versatility and Performance

On Ice



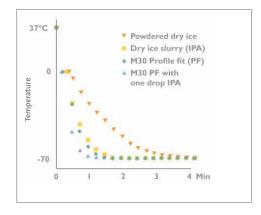
- Adapts from ambient (25°C) to <4°C in 60 to 90 seconds*
- ▶ Samples and labels stay dry, organized
- Hours of ice cooling without direct ice contact
- ▶ Reproducible method

Corning CoolRack module on Corning ThermalTray in full pan of ice Corning CoolRack module directly in ice 6 Hours 14 Hours

On Dry Ice



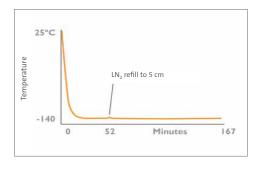
- Adapts from ambient (25°C) to -78°C in approximately 5 to 7 minutes*
- ▶ Eliminates ethanol from snap freezing
- ▶ Samples are upright and organized as they freeze
- Equal or better freezing rate as compared to direct immersion into dry ice or alcohol slurry
- ▶ Reproducible method



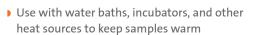
In Liquid Nitrogen (LN₂)



- Adapts from ambient (25°C) to approximately
 -150°C in approximately 12 to 14 minutes*
- Vapor barrier protects from ambient air
- Samples are upright and organized as they freeze
- No direct contact between samples and LN2
- ▶ Reproducible method



With Heat Sources



^{*}Average cooling rate from room temperature.



Ordering Information

Corning® CoolRack® M Microcentrifuge Modules

VWR Cat. No.	Corning Cat. No.	Description	No. of Wells	Well Shape	Dimensions (L x W x H) (cm)	Well Diameter (mm)	Well Depth (mm)	Row Spacing (mm)	Column Spacing (mm)
75779-878 75779-880 75779-882	432034 432035 432036	CoolRack M6, gray CoolRack M6, green CoolRack M6, orange	6	Cylindrical	6.0 x 4.3 x 3.8	11.1	32.7	17.8	17.8
75779-884 75779-886 75779-888	432037 432038 432039	CoolRack M15, gray CoolRack M15, green CoolRack M15, orange	15	Cylindrical	10 2 x 6.4 x 3.8	11.1	32.7	17.8	17.8
75779-728	432047	CoolRack M15-PF	15	Conical	10 2 x 6.4 x 3.8	11.1	35.3	17.8	17.8
75779-890	432040	CoolRack XT M24*	24	Cylindrical	12.8 x 8.5 x 3.8	11.1	32.7	17.8	17.8
75779-746	432060	CoolRack XT 5 mL*	12	Conical	12.7 x 8.6 x 5.0	16.5	48.7	28.0	28.0
75779-892 75779-894 75779-896	432041 432042 432043	CoolRack M30, gray CoolRack M30, green CoolRack M30, orange	30	Cylindrical	12.0 x 10.2 x 3.8	11.1	32.7	17.8	17.8
75779-832	432048	CoolRack M30-PF	30	Conical	12.0 x 10.2 x 3.8	11.1	35.3	17.8	17.8
75779-726	432046	CoolRack 500 μL M30-PF	30	Conical	12.0 x 10.2 x 3.8	11.1	35.3	17.8	17.8
75779-898	432044	CoolRack M90	90	Cylindrical	26.8 x 11.2 x 3.8	11.1	32.7	17.8	17.8
75779-900	432045	CoolRack M96 ID**	96	Cylindrical	25.4 x 15.2 x 3.8	11.1	32.7	17.8	17.8

^{*}SBS-compatible.

Corning CoolRack CF Cryogenic Vial and FACS Tube Modules

VWR Cat. No.	Corning Cat. No.	Description	No. of Wells	Well Shape	Dimensions (L x W x H) (cm)	Well Diameter (mm)	Well Depth (mm)	Row Spacing (mm)	Column Spacing (mm)
75779-834	432049	CoolRack CF15	15	Cylindrical	10.2 x 6.4 x 3.8	12.7	32.7	17.8	17.8
75779-836	432050	CoolRack XT CFT24*†	24	Cylindrical	12.8 x 8.5 x 3.8	12.7	32.7	17.8	17.8
75779-730	432052	CoolRack CFT30 [†]	30	Cylindrical	12.0 x 10.2 x 3.8	12.7	32.7	17.8	17.8
75779-838	432051	CoolRack CF45	45	Cylindrical	17 3 x 9.7 x 3.8	12.7	32.7	17.8	17.8

^{*}SBS-compatible.

Corning CoolRack PCR Microplate, Strip Tubes, or Tube Modules

VWR Cat. No.	Corning Cat. No.	Description	No. of Wells	Well Shape	Dimensions (L x W x H) (cm)	Well Diameter (mm)	Well Depth (mm)	Row Spacing (mm)	Column Spacing (mm)
75779-732	432053	CoolRack XT PCR96*	96	Tapered	12.7 x 8.6 x 2.5	_	13.2	9.0	9.0
75779-734	432054	CoolRack XT M-PCR*	48 (PCR) 12 (M)	Tapered (PCR) Cylindrical (M)	12.7 x 8.6 x 3.8	- 11.1	13.2 32.7	9.0 14.0	9.0 20.3
75779-736	432055	CoolRack XT PCR384*	384	Tapered	12.7 x 8.6 x 1.9	_	7.6	4.5	4.5

^{*}SBS-compatible.

Corning CoolRack 96 Storage Tube Modules

VWR Cat. No.	Corning Cat. No.	Description	No. of Wells	Well Shape	Dimensions (L x W x H) (cm)	Well Diameter (mm)	Well Depth (mm)	Row Spacing (mm)	Column Spacing (mm)
75779-738	432056	CoolRack 96 x 0.5 mL	96	Cylindrical	13.1 x 8.9 x 3.6	8.4	24.6	9.0	9.0
75779-740	432057	CoolRack 96 x 1 mL	96	Cvlindrical	13.2 x 8.9 x 3.6	8.3	32.7	14.0	17.8

Corning CoolRack SV Sample Vial Modules for Cell Therapy

commission summission con mercely						Well	Well	Row	Column
VWR Cat. No.	Corning Cat. No.	Description	No. of Wells	Well Shape	Dimensions (L x W x H) (cm)	Diameter (mm)	Depth (mm)	Spacing (mm)	Spacing (mm)
75779-742	432058	CoolRack SV2	12	Cylindrical	12.7 x 8.6 x 3.8	16.0	24.0	27.0	30.0
75779-744	32059	CoolRack SV10	12	Cylindrical	12.7 x 8.6 x 3.8	23.6	27.9	25.9	32.1

^{**}Corning CoolRack M96 ID has A-H and 1-12 row and column indexing.

^{† &}quot;Gripping" wells for one-hand vial opening/closing.

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Ordering Information (Continued)

Corning® CoolRack® – Tall Modules

VWR Cat. No.	Corning Cat. No.	Description	No. of Wells	Well Shape	Dimensions (L x W x H) (cm)	Well Diameter (mm)	Well Depth (mm)	Row Spacing (mm)	Column Spacing (mm)
75779-762	432068	CoolRack L*	12	Cylindrical	13.7 x 9.5 x 11.8	17.5	105.4	25.4	30.5
75779-748	432061	CoolRack 15 mL	9	Cylindrical	8.9 x 8.9 x 10.7	17 1	106.7	26.7	26.7
75779-750	432062	CoolRack 50 mL	4	Cylindrical	8.9 x 8.9 x 10.7	29.5	101.6	40.6	40.6
75779-752	432063	CoolRack 250 mL-PF	1	Conical	8.9 x 8.9 x 14.0	60.4	133.3	_	_
75779-754	432064	CoolRack 250 mL	1	Cylindrical	8.9 x 8.9 x 7.2	73.6	66.5	_	_
75779-764	432069	CoolRack LV*	12	Cylindrical	13.7 x 9.5 x 9.6	16.6	83 3	25.4	30.5
75779-756	432065	CoolRack VS13	9	Cylindrical	8.9 x 8.9 x 6.1	13.0	61.0	26.7	26.7
75779-760	432067	CoolRack V13	9	Cylindrical	8.9 x 8.9 x 8.4	13.0	83.8	26.7	26.7
75779-758	432066	CoolRack V16	9	Cylindrical	8.9 x 8.9 x 8.4	16.0	83.8	26.7	26.7

^{*}Thermo-conductive base and insulative exterior.



Corning CoolRack – Reagent Reservoir Modules

VWR	Corning	Description	Dimensions
Cat. No.	Cat. No.		(L x W x H) (cm)
76332-750	432139	CoolRack LX 50*	13.7 x 9.5 x 11.8

 $^{^*} Compatible \ with \ one \ Axygen ^{\circledcirc} 50 \ mL \ disposable \ reagent \ reservoir \ (RES-V-50, RES-V-50-S, or \ RES-V-50-SI).$

Corning Cryogenic Vial Grippers



VWR Cat. No.	Corning Cat. No.	Description
75779-848	432136	Cryogenic vial grippers, multi-color (5/cs)

Contact your VWR Representative for a copy of the Corning CoolBox™ and CoolRack Consumable Compatibility Guide.

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CORNING

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