Part No. ActVO-4 (200 mM). Volumes: 6 ml, 12 ml, 20 ml, 30 ml, 50 ml



Synonyms: Sodium Vanadate, Vanadate

Specifications:

Chemical Formula: Na₃V0₄ CAS Number: 13721-39-6 Purity of starting material: >99% Molecular Weight: 183.9 Solubility in water: soluble Provided as: 200 mM aqueous solution Inhibitor of tyrosyl-phosphatases, alkaline phosphatases and Na,K,ATPases, including MDR (multidrug resistance receptor; P-glycoprotein)

Lot 26717-1 Exp 5/19

Sodium orthovanadate is a potent inhibitor of tyrosine phosphatases, alkaline phosphatases and ATPases by operating as a phosphate analogue. Part ActVO-4 has undergone an activation-depolymerization preparation that involves pH adjustment, heating until colorless at equilibrium at pH 10.0, and filtering^{1,2}.

Activated sodium orthovanadate is added directly to cell lysis buffers to inhibit tyrosyl-phosphatases and preserve protein phosphorylation.

Directions: Provided as a 200 mM solution. Use at 1-10 mM. Dispense directly into cell lysates. (After defrosting, vortex to solubilize crystals).

References

- 1. Gordon, J.: Methods Enzymol. (1991) 201, 477-482.
- 2. Huyer, G., et al.: J. Biol. Chem. (1997) 272, 843-851.

Part No. ActVO-4 (200 mM). Volumes: 6 ml, 12 ml, 20 ml, 30 ml, 50 ml



Synonyms: Sodium Vanadate, Vanadate

Specifications:

Chemical Formula: Na₃V0₄ CAS Number: 13721-39-6 Purity of starting material: >99% Molecular Weight: 183.9 Solubility in water: soluble Provided as: 200 mM aqueous solution Inhibitor of tyrosyl-phosphatases, alkaline phosphatases and Na,K,ATPases, including MDR (multidrug resistance receptor; P-glycoprotein)

Lot 26716-1 Exp 12/18

Sodium orthovanadate is a potent inhibitor of tyrosine phosphatases, alkaline phosphatases and ATPases by operating as a phosphate analogue. Part ActVO-4 has undergone an activation-depolymerization preparation that involves pH adjustment, heating until colorless at equilibrium at pH 10.0, and filtering^{1,2}.

Activated sodium orthovanadate is added directly to cell lysis buffers to inhibit tyrosyl-phosphatases and preserve protein phosphorylation.

Directions: Provided as a 200 mM solution. Use at 1-10 mM. Dispense directly into cell lysates. (After defrosting, vortex to solubilize crystals).

References

- 1. Gordon, J.: Methods Enzymol. (1991) 201, 477-482.
- 2. Huyer, G., et al.: J. Biol. Chem. (1997) 272, 843-851.

Part No. ActVO-4 (200 mM). Volumes: 6 ml, 12 ml, 20 ml, 30 ml, 50 ml



Synonyms: Sodium Vanadate, Vanadate

Specifications:

Chemical Formula: Na₃V0₄ CAS Number: 13721-39-6 Purity of starting material: >99% Molecular Weight: 183.9 Solubility in water: soluble Provided as: 200 mM aqueous solution Inhibitor of tyrosyl-phosphatases, alkaline phosphatases and Na,K,ATPases, including MDR (multidrug resistance receptor; P-glycoprotein)

Lot 26715-1 Exp 8/18

Sodium orthovanadate is a potent inhibitor of tyrosine phosphatases, alkaline phosphatases and ATPases by operating as a phosphate analogue. Part ActVO-4 has undergone an activation-depolymerization preparation that involves pH adjustment, heating until colorless at equilibrium at pH 10.0, and filtering^{1,2}.

Activated sodium orthovanadate is added directly to cell lysis buffers to inhibit tyrosyl-phosphatases and preserve protein phosphorylation.

Directions: Provided as a 200 mM solution. Use at 1-10 mM. Dispense directly into cell lysates. (After defrosting, vortex to solubilize crystals).

References

- 1. Gordon, J.: Methods Enzymol. (1991) 201, 477-482.
- 2. Huyer, G., et al.: J. Biol. Chem. (1997) 272, 843-851.

Part No. ActVO-4 (200 mM). Volumes: 6 ml, 12 ml, 20 ml, 30 ml, 50 ml



Synonyms: Sodium Vanadate, Vanadate

Specifications:

Chemical Formula: Na₃V0₄ CAS Number: 13721-39-6 Purity of starting material: >99% Molecular Weight: 183.9 Solubility in water: soluble Provided as: 200 mM aqueous solution Inhibitor of tyrosyl-phosphatases, alkaline phosphatases and Na,K,ATPases, including MDR (multidrug resistance receptor; P-glycoprotein)

Lot 26714-1 Exp. 3/18

Sodium orthovanadate is a potent inhibitor of tyrosine phosphatases, alkaline phosphatases and ATPases by operating as a phosphate analogue. Part ActVO-4 has undergone an activation-depolymerization preparation that involves pH adjustment, heating until colorless at equilibrium at pH 10.0, and filtering^{1,2}.

Activated sodium orthovanadate is added directly to cell lysis buffers to inhibit tyrosyl-phosphatases and preserve protein phosphorylation.

Directions: Provided as a 200 mM solution. Use at 1-10 mM. Dispense directly into cell lysates. (After defrosting, vortex to solubilize crystals).

References

- 1. Gordon, J.: Methods Enzymol. (1991) 201, 477-482.
- 2. Huyer, G., et al.: J. Biol. Chem. (1997) 272, 843-851.

Part No. ActVO-4 (200 mM). Volumes: 6 ml, 12 ml, 20 ml, 30 ml, 50 ml



Synonyms: Sodium Vanadate, Vanadate

Specifications:

Chemical Formula: Na₃V0₄ CAS Number: 13721-39-6 Purity of starting material: >99% Molecular Weight: 183.9 Solubility in water: soluble Provided as: 200 mM aqueous solution Inhibitor of tyrosyl-phosphatases, alkaline phosphatases and Na,K,ATPases, including MDR (multidrug resistance receptor; P-glycoprotein)

Lot 26713-1 Exp. 10/17

Sodium orthovanadate is a potent inhibitor of tyrosine phosphatases, alkaline phosphatases and ATPases by operating as a phosphate analogue. Part ActVO-4 has undergone an activation-depolymerization preparation that involves pH adjustment, heating until colorless at equilibrium at pH 10.0, and filtering^{1,2}.

Activated sodium orthovanadate is added directly to cell lysis buffers to inhibit tyrosyl-phosphatases and preserve protein phosphorylation.

Directions: Provided as a 200 mM solution. Use at 1-10 mM. Dispense directly into cell lysates. (After defrosting, vortex to solubilize crystals).

References

- 1. Gordon, J.: Methods Enzymol. (1991) 201, 477-482.
- 2. Huyer, G., et al.: J. Biol. Chem. (1997) 272, 843-851.

Part No. ActVO-4 (200 mM). Volumes: 6 ml, 12 ml, 20 ml, 30 ml, 50 ml



Synonyms: Sodium Vanadate, Vanadate

Specifications:

Chemical Formula: Na₃V0₄ CAS Number: 13721-39-6 Purity of starting material: >99% Molecular Weight: 183.9 Solubility in water: soluble Provided as: 200 mM aqueous solution Inhibitor of tyrosyl-phosphatases, alkaline phosphatases and Na,K,ATPases, including MDR (multidrug resistance receptor; P-glycoprotein)

Lot 26712-1 Exp. 8/17

Sodium orthovanadate is a potent inhibitor of tyrosine phosphatases, alkaline phosphatases and ATPases by operating as a phosphate analogue. Part ActVO-4 has undergone an activation-depolymerization preparation that involves pH adjustment, heating until colorless at equilibrium at pH 10.0, and filtering^{1,2}.

Activated sodium orthovanadate is added directly to cell lysis buffers to inhibit tyrosyl-phosphatases and preserve protein phosphorylation.

Directions: Provided as a 200 mM solution. Use at 1-10 mM. Dispense directly into cell lysates. (After defrosting, vortex to solubilize crystals).

References

- 1. Gordon, J.: Methods Enzymol. (1991) 201, 477-482.
- 2. Huyer, G., et al.: J. Biol. Chem. (1997) 272, 843-851.

Part No. ActVO-4 (200 mM). Volumes: 6 ml, 12 ml, 20 ml, 30 ml, 50 ml



Synonyms: Sodium Vanadate, Vanadate

Specifications:

Chemical Formula: Na₃V0₄ CAS Number: 13721-39-6 Purity of starting material: >99% Molecular Weight: 183.9 Solubility in water: soluble Provided as: 200 mM aqueous solution Inhibitor of tyrosyl-phosphatases, alkaline phosphatases and Na,K,ATPases, including MDR (multidrug resistance receptor; P-glycoprotein)

Lot 26711-1 Exp. 4/17

Sodium orthovanadate is a potent inhibitor of tyrosine phosphatases, alkaline phosphatases and ATPases by operating as a phosphate analogue. Part ActVO-4 has undergone an activation-depolymerization preparation that involves pH adjustment, heating until colorless at equilibrium at pH 10.0, and filtering^{1,2}.

Activated sodium orthovanadate is added directly to cell lysis buffers to inhibit tyrosyl-phosphatases and preserve protein phosphorylation.

Directions: Provided as a 200 mM solution. Use at 1-10 mM. Dispense directly into cell lysates. (After defrosting, vortex to solubilize crystals).

References

- 1. Gordon, J.: Methods Enzymol. (1991) 201, 477-482.
- 2. Huyer, G., et al.: J. Biol. Chem. (1997) 272, 843-851.

Part No. ActVO-4 (200 mM). Volumes: 6 ml, 12 ml, 20 ml, 30 ml, 50 ml



Synonyms: Sodium Vanadate, Vanadate

Specifications:

Chemical Formula: Na₃V0₄ CAS Number: 13721-39-6 Purity of starting material: >99% Molecular Weight: 183.9 Solubility in water: soluble Provided as: 200 mM aqueous solution Inhibitor of tyrosyl-phosphatases, alkaline phosphatases and Na,K,ATPases, including MDR (multidrug resistance receptor; P-glycoprotein)

Lot 26710-1 Exp. 12/16

Sodium orthovanadate is a potent inhibitor of tyrosine phosphatases, alkaline phosphatases and ATPases by operating as a phosphate analogue. Part ActVO-4 has undergone an activation-depolymerization preparation that involves pH adjustment, heating until colorless at equilibrium at pH 10.0, and filtering^{1,2}.

Activated sodium orthovanadate is added directly to cell lysis buffers to inhibit tyrosyl-phosphatases and preserve protein phosphorylation.

Directions: Provided as a 200 mM solution. Use at 1-10 mM. Dispense directly into cell lysates. (After defrosting, vortex to solubilize crystals).

References

- 1. Gordon, J.: Methods Enzymol. (1991) 201, 477-482.
- 2. Huyer, G., et al.: J. Biol. Chem. (1997) 272, 843-851.

FIVEphoton Biochemicals Tm

Specification Sheet: Sodium Orthovanadate (Vanadate); Activated, Ready-to-Use Solution

Part No. ActVO-4 (200 mM). Volumes: 6 ml, 12 ml, 20 ml, 30 ml, 50 ml

Synonyms: Sodium Vanadate, Vanadate

Specifications:

Chemical Formula: Na₃V0₄ CAS Number: 13721-39-6 Purity: >98% Molecular Weight: 183.9 Solubility in water: soluble Provided as: 200 mM aqueous solution Inhibitor of tyrosyl-phosphatases, alkaline phosphatases and Na,K,ATPases, including MDR (multidrug resistance receptor; P-glycoprotein)

Lot 26718-9 Exp. 6/16

Sodium orthovanadate (activated) is a potent inhibitor of tyrosine phosphatases, alkaline phosphatases and ATPases by operating as a phosphate analogue. ActVO-4 has undergone an activation-depolymerization preparation that involves pH adjustment, heating until colorless at equilibrium at pH 10.0, and filtering^{1,2}.

Activated sodium orthovanadate is added directly to cell lysis buffers to inhibit tyrosyl-phosphatases and preserve protein phosphorylation.

Directions: Provided as a 200 mM solution. Use at 1-10 mM. Dispense directly into cell lysates. (After defrosting, vortex to solubilize crystals).

References

- 1. Gordon, J.: Methods Enzymol. (1991) 201, 477-482.
- 2. Huyer, G., et al.: J. Biol. Chem. (1997) 272, 843-851.

Lot 26718-9 Exp. 6/16

FIVEphoton Biochemicals Tm

Specification Sheet: Sodium Orthovanadate (Vanadate); Activated, Ready-to-Use Solution

Part No. ActVO-4 (200 mM). Volumes: 6 ml, 12 ml, 20 ml, 30 ml, 50 ml

Synonyms: Sodium Vanadate, Vanadate

Specifications:

Chemical Formula: Na₃V0₄ CAS Number: 13721-39-6 Purity: >98% Molecular Weight: 183.9 Solubility in water: soluble Provided as: 200 mM aqueous solution Inhibitor of tyrosyl-phosphatases, alkaline phosphatases and Na,K,ATPases, including MDR (multidrug resistance receptor; P-glycoprotein)

Lot 26717-9 Exp. 12/15

Sodium orthovanadate (activated) is a potent inhibitor of tyrosine phosphatases, alkaline phosphatases and ATPases by operating as a phosphate analogue. ActVO-4 has undergone an activation-depolymerization preparation that involves pH adjustment, heating until colorless at equilibrium at pH 10.0, and filtering^{1,2}.

Activated sodium orthovanadate is added directly to cell lysis buffers to inhibit tyrosyl-phosphatases and preserve protein phosphorylation.

Directions: Provided as a 200 mM solution. Use at 1-10 mM. Dispense directly into cell lysates. (After defrosting, vortex to solubilize crystals).

References

- 1. Gordon, J.: Methods Enzymol. (1991) 201, 477-482.
- 2. Huyer, G., et al.: J. Biol. Chem. (1997) 272, 843-851.

Lot 26717-9 Exp. 12/15

FIVEphoton BiochemicalsTm

Specification Sheet: Sodium Orthovanadate (Vanadate); Activated, Ready-to-Use Solution

Part No. ActVO-4 (200 mM). Volumes: 6 ml, 12 ml, 20 ml, 30 ml

Synonyms: Sodium Vanadate, Vanadate

Specifications:

Chemical Formula: Na₃V0₄ CAS Number: 13721-39-6 Concentration: 200 mM. Formulated from >99% solid stock. Molecular Weight: 183.9 Solubility in water: soluble Inhibitor of tyrosyl-phosphatases, alkaline phosphatases and Na,K,ATPases, including MDR (multidrug resistance receptor; P-glycoprotein)

Sodium orthovanadate (activated) is a potent inhibitor of tyrosine phosphatases, alkaline phosphatases and ATPases by operating as a phosphate analogue. ActVO-4 has undergone an activation-depolymerization preparation that involves pH adjustment, heating until colorless at equilibrium at pH10.0, and filtering^{1,2}.

Activated sodium orthovanadate is added directly to cell lysis buffers to inhibit tyrosyl-phosphatases and preserve protein phosphorylation.

Directions: Provided as a 200 mM solution. Use at 1 mM. Dispense directly into cell lysates. (After defrosting, vortex to solubilize crystals).

Certain buffer components such as EDTA and oxidants interact with vanadate potency. The addition of EDTA chelates vanadate and reverses inhibition. HEPES is a preferred buffer to minimize interference with vanadate (see reference 2).

References

- 1. Gordon, J.: Methods Enzymol. (1991) 201, 477-482.
- 2. Huyer, G., et al.: J. Biol. Chem. (1997) 272, 843-851.

Lot 26716-4, Exp 6/15

FIVEphoton BiochemicalsTm

Specification Sheet: Sodium Orthovanadate (Vanadate); Activated, Ready-to-Use Solution

Part No. ActVO-4 (200 mM). Volumes: 6 ml, 12 ml, 20 ml, 30 ml



Synonyms: Sodium Vanadate, Vanadate

Specifications:

Chemical Formula: Na₃V0₄ CAS Number: 13721-39-6 Concentration: 200 mM. Formulated from >99% solid stock. Molecular Weight: 183.9 Solubility in water: soluble Inhibitor of tyrosyl-phosphatases, alkaline phosphatases and Na,K,ATPases, including MDR (multidrug resistance receptor; P-glycoprotein)

Sodium orthovanadate (activated) is a potent inhibitor of tyrosine phosphatases, alkaline phosphatases and ATPases by operating as a phosphate analogue. ActVO-4 has undergone an activation-depolymerization preparation that involves pH adjustment, heating until colorless at equilibrium at pH10.0, and filtering^{1,2}.

Activated sodium orthovanadate is added directly to cell lysis buffers to inhibit tyrosyl-phosphatases and preserve protein phosphorylation.

Directions: Provided as a 200 mM solution. Use at 1 mM. Dispense directly into cell lysates. (After defrosting, vortex to solubilize crystals).

Certain buffer components such as EDTA and oxidants interact with vanadate potency. The addition of EDTA chelates vanadate and reverses inhibition. HEPES is a preferred buffer to minimize interference with vanadate (see reference 2).

References

- 1. Gordon, J.: Methods Enzymol. (1991) 201, 477-482.
- 2. Huyer, G., et al.: J. Biol. Chem. (1997) 272, 843-851.

Lot 26715-4, Exp 12/14