

• SAFETY DATA SHEET

Version 9.0
Revision Date 09/24/2025
Print Date 09/25/2025

SECTION 1. IDENTIFICATION

1.1 Product identifiers

Product name : Phospho-Akt (pSer⁴⁷³) ELISA Kit

Product Number : RAB0011

Brand : Sigma

1.2 Relevant identified uses of the substance or mixture and uses advised against

Identified uses : Laboratory chemicals, Synthesis of substances

Uses advised against : The product is being supplied under the TSCA R&D Exemption (40 CFR Section 720.36). It is the recipient's responsibility to comply with the requirements of the R&D exemption. The product may not be used for a non-exempt commercial purpose under TSCA unless appropriate consent is granted in writing by MilliporeSigma.

1.3 Details of the supplier of the safety data sheet

Company : Sigma-Aldrich Inc.
3050 SPRUCE ST
ST. LOUIS MO 63103
UNITED STATES

Telephone : +1 314 771-5765

Fax : +1 800 325-5052

1.4 Emergency telephone number

Emergency Phone # : 800-424-9300 CHEMTREC (USA) +1-703-
527-3887 CHEMTREC (International) 24
Hours/day; 7 Days/week

This is a summary SDS for a kit. For the full SDS for each of the components listed in section 16 please visit our website.

This is a summary SDS for a kit. For the full SDS for each of the components listed in section 16 please visit our website.

SECTION 2. HAZARDS IDENTIFICATION

GHS classification in accordance with the OSHA Hazard Communication Standard (29 CFR 1910.1200)

Hazards for the product as supplied

Corrosive to metals : Category 1

Carcinogenicity : Category 2

Other hazards

None known.

GHS label elements

Hazard pictograms :



Signal Word : Warning

Hazard Statements : H290 May be corrosive to metals.
H351 Suspected of causing cancer.

Precautionary statements : **Prevention:**
P201 Obtain special instructions before use.
P202 Do not handle until all safety precautions have been read and understood.
P234 Keep only in original packaging.
P280 Wear protective gloves/ protective clothing/ eye protection/ face protection.

Response:

P308 + P313 IF exposed or concerned: Get medical advice/ attention.
P390 Absorb spillage to prevent material damage.

Storage:

P405 Store locked up.
P406 Store in a corrosion resistant container with a resistant inner liner.

Disposal:

P501 Dispose of contents/ container to an approved waste disposal plant.

SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS

Refer to component SDS

SECTION 4. FIRST AID MEASURES

Refer to component SDS

SECTION 5. FIREFIGHTING MEASURES

Refer to component SDS

SECTION 6. ACCIDENTAL RELEASE MEASURES

Refer to component SDS

SECTION 7. HANDLING AND STORAGE

For precautions see section 2.2.

Conditions for safe storage : Keep container tightly closed in a dry and well-ventilated place.

No metal containers.

Further information on storage conditions : Tightly closed.

Storage class : 12, Non Combustible Liquids

Recommended storage temperature : -4 °F / -20 °C

SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Refer to component SDS

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Refer to component SDS

SECTION 10. STABILITY AND REACTIVITY

Refer to component SDS

SECTION 11. TOXICOLOGICAL INFORMATION

Refer to component SDS

SECTION 12. ECOLOGICAL INFORMATION

Refer to component SDS

SECTION 13. DISPOSAL CONSIDERATIONS

Refer to component SDS

SECTION 14. TRANSPORT INFORMATION

International Regulations

IATA-DGR

UN/ID No. : UN 3264
Proper shipping name : Corrosive liquid, acidic, inorganic, n.o.s.
(sulphuric acid)
Class : 8
Packing group : III
Labels : Class 8 - Corrosive substances
Packing instruction (cargo aircraft) : 856
Packing instruction (passenger aircraft) : 852

IMDG-Code

UN number : UN 3264
Proper shipping name : CORROSIVE LIQUID, ACIDIC, INORGANIC, N.O.S.
(sulphuric acid)
Class : 8
Packing group : III
Labels : 8
EmS Code : F-A, S-B
Marine pollutant : no

Transport in bulk according to IMO instruments

Not applicable for product as supplied.

National Regulations

49 CFR Road

UN/ID/NA number : UN 3264
Proper shipping name : Corrosive liquid, acidic, inorganic, n.o.s.
(sulphuric acid)
Class : 8
Packing group : III
Labels : Class 8 - Corrosive substances
ERG Code : 154
Marine pollutant : no

Poison Inhalation Hazard : No

Special precautions for user

The transport classification(s) provided herein are for informational purposes only, and solely based upon the properties of the unpackaged material as it is described within this Safety Data Sheet. Transportation classifications may vary by mode of transportation, package sizes, and variations in regional or country regulations.

SECTION 15. REGULATORY INFORMATION

CERCLA Reportable Quantity

Components	CAS-No.	Component RQ (lbs)	Calculated product RQ (lbs)
Phosphorylation ELISA Stop Solution (Item I)	7664-93-9	50000	50000

SARA 304 Extremely Hazardous Substances Reportable Quantity

Components	CAS-No.	Component RQ (lbs)	Calculated product RQ (lbs)
Phosphorylation ELISA Stop Solution (Item I)	7664-93-9	50000	50000

SARA 302 Extremely Hazardous Substances Threshold Planning Quantity

Components	CAS-No.	Component TPQ (lbs)
20X Wash Buffer Concentrate (Item B)	Not Assigned	
Phospho-Akt(pSer473)-specific Antibody Concentrate (Item C1)	Not Assigned	
HRP-conjugated Anti-Rabbit IgG Concentrate (Item D1)	Not Assigned	
5X Assay Diluent (Item E)	Not Assigned	
TMB One-Step Substrate Reagent (Item H)	Not Assigned	
Phosphorylation ELISA Stop Solution (Item I)	7664-93-9	
2X Cell Lysate Buffer (Item J)	Not Assigned	
Phospho-Akt (pSer473) Lyophilized Positive Control Sample (Item K)	Not Assigned	

SARA 311/312 Hazards : Acute Health Hazard
Chronic Health Hazard

SARA 313 : This material does not contain any chemical components with known CAS numbers that exceed the threshold (De Minimis) reporting levels established by SARA Title III, Section 313.

Clean Air Act

Warning: Manufactured with Phosphorylation ELISA Stop Solution (Item I), a substance which harms public health and environment by destroying ozone in the upper atmosphere.

40 CFR Protection of :
Environment; Part 82
Protection of
Stratospheric Ozone -
CAA Section 602 Class I
SubstancesOzone-
Depletion Potential

7664-93-9

This product does not contain any hazardous air pollutants (HAP), as defined by the U.S. Clean Air Act Section 112 (40 CFR 61).

The following chemical(s) are listed under the U.S. Clean Air Act Section 112(r) for Accidental Release Prevention (40 CFR 68.130, Subpart F):

Phosphorylation	7664-93-9	>= 90 - <= 100 %
ELISA Stop Solution (Item I)		

The following chemical(s) are listed under the U.S. Clean Air Act Section 111 SOCM I Intermediate or Final VOC's (40 CFR 60.489):

Phosphorylation	7664-93-9	>= 90 - <= 100 %
ELISA Stop Solution (Item I)		

Clean Water Act

The following Hazardous Substances are listed under the U.S. CleanWater Act, Section 311, Table 116.4A:

Phosphorylation	7664-93-9	>= 90 - <= 100 %
ELISA Stop Solution (Item I)		

The following Hazardous Chemicals are listed under the U.S. CleanWater Act, Section 311, Table 117.3:

Phosphorylation	7664-93-9	>= 90 - <= 100 %
ELISA Stop Solution (Item I)		

This product contains the following toxic pollutants listed under the U.S. Clean Water Act Section 307

Phosphorylation	7664-93-9	>= 90 - <= 100 %
ELISA Stop Solution (Item I)		

This product contains the following priority pollutants related to the U.S. Clean Water Act:

Phosphorylation	7664-93-9	>= 90 - <= 100 %
ELISA Stop Solution (Item I)		

US State Regulations

Massachusetts Right To Know

20X Wash Buffer Concentrate (Item B)	Not Assigned
Phospho-Akt(pSer473)-specific Antibody Concentrate (Item C1)	Not Assigned
HRP-conjugated Anti-Rabbit IgG Concentrate (Item D1)	Not Assigned
5X Assay Diluent (Item E)	Not Assigned
TMB One-Step Substrate Reagent (Item H)	Not Assigned
Phosphorylation ELISA Stop Solution (Item I)	7664-93-9

2X Cell Lysate Buffer (Item J)	Not Assigned
Phospho-Akt (pSer473) Lyophilized Positive Control Sample (Item K)	Not Assigned

Pennsylvania Right To Know

20X Wash Buffer Concentrate (Item B)	Not Assigned
Phospho-Akt(pSer473)-specific Antibody Concentrate (Item C1)	Not Assigned
HRP-conjugated Anti-Rabbit IgG Concentrate (Item D1)	Not Assigned
5X Assay Diluent (Item E)	Not Assigned
TMB One-Step Substrate Reagent (Item H)	Not Assigned
Phosphorylation ELISA Stop Solution (Item I)	7664-93-9

Maine Chemicals of High Concern

20X Wash Buffer Concentrate (Item B)	Not Assigned
Phospho-Akt(pSer473)-specific Antibody Concentrate (Item C1)	Not Assigned
HRP-conjugated Anti-Rabbit IgG Concentrate (Item D1)	Not Assigned
5X Assay Diluent (Item E)	Not Assigned
TMB One-Step Substrate Reagent (Item H)	Not Assigned
Phosphorylation ELISA Stop Solution (Item I)	7664-93-9
2X Cell Lysate Buffer (Item J)	Not Assigned
Phospho-Akt (pSer473) Lyophilized Positive Control Sample (Item K)	Not Assigned

Vermont Chemicals of High Concern

20X Wash Buffer Concentrate (Item B)	Not Assigned
Phospho-Akt(pSer473)-specific Antibody Concentrate (Item C1)	Not Assigned
HRP-conjugated Anti-Rabbit IgG Concentrate (Item D1)	Not Assigned
5X Assay Diluent (Item E)	Not Assigned
TMB One-Step Substrate Reagent (Item H)	Not Assigned
Phosphorylation ELISA Stop Solution (Item I)	7664-93-9
2X Cell Lysate Buffer (Item J)	Not Assigned
Phospho-Akt (pSer473) Lyophilized Positive Control Sample (Item K)	Not Assigned

Washington Chemicals of High Concern

20X Wash Buffer Concentrate (Item B)	Not Assigned
Phospho-Akt(pSer473)-specific Antibody Concentrate (Item C1)	Not Assigned
HRP-conjugated Anti-Rabbit IgG Concentrate (Item D1)	Not Assigned
5X Assay Diluent (Item E)	Not Assigned
TMB One-Step Substrate Reagent (Item H)	Not Assigned
Phosphorylation ELISA Stop Solution (Item I)	7664-93-9
2X Cell Lysate Buffer (Item J)	Not Assigned
Phospho-Akt (pSer473) Lyophilized Positive Control Sample (Item K)	Not Assigned

The components of this product are reported in the following inventories:

TSCA : Product contains substance(s) not listed on TSCA inventory.

TSCA list

The following substance(s) is/are subject to a Significant New Use Rule:

20X Wash Buffer Concentrate (Item B)	Not Assigned
Phospho-Akt(pSer473)-specific Antibody Concentrate (Item C1)	Not Assigned
HRP-conjugated Anti-Rabbit IgG Concentrate (Item D1)	Not Assigned
5X Assay Diluent (Item E)	Not Assigned
TMB One-Step Substrate Reagent (Item H)	Not Assigned
Phosphorylation ELISA Stop Solution (Item I)	7664-93-9
2X Cell Lysate Buffer (Item J)	Not Assigned
Phospho-Akt (pSer473)	Not Assigned
Lyophilized Positive Control Sample (Item K)	

The following substance(s) is/are subject to TSCA 12(b) export notification requirements:

20X Wash Buffer Concentrate (Item B)	Not Assigned
Phospho-Akt(pSer473)-specific Antibody Concentrate (Item C1)	Not Assigned
HRP-conjugated Anti-Rabbit IgG Concentrate (Item D1)	Not Assigned
5X Assay Diluent (Item E)	Not Assigned
TMB One-Step Substrate Reagent (Item H)	Not Assigned
Phosphorylation ELISA Stop Solution (Item I)	7664-93-9
2X Cell Lysate Buffer (Item J)	Not Assigned
Phospho-Akt (pSer473)	Not Assigned
Lyophilized Positive Control Sample (Item K)	

SECTION 16. OTHER INFORMATION

Kit Components:

20X Wash Buffer Concentrate (Item B)	Sigma	RABWASH5
Phospho-Akt(pSer473)-specific Antibody Concentrate (Item C1)	Sigma	RABA473C1
HRP-conjugated Anti-Rabbit IgG Concentrate	Sigma	RABHRP4

Sigma - RAB0011

Page 8 of 13

(Item D1)		
5X Assay Diluent (Item E)	Sigma	RABDIL11
TMB One-Step Substrate Reagent (Item H)	Sigma	RABTMB4
Phosphorylation ELISA Stop Solution (Item I)	Sigma	RABSTOP4
2X Cell Lysate Buffer (Item J)	Sigma	RABCLB1
Phospho-Akt (pSer473) Lyophilized Positive Control Sample (Item K)	Sigma	RABA473K

Relevant changes since previous version

7. Handling and storage

Full text of other abbreviations

AIIC - Australian Inventory of Industrial Chemicals; ASTM - American Society for the Testing of Materials; bw - Body weight; CERCLA - Comprehensive Environmental Response, Compensation, and Liability Act; CMR - Carcinogen, Mutagen or Reproductive Toxicant; DIN - Standard of the German Institute for Standardisation; DOT - Department of Transportation; DSL - Domestic Substances List (Canada); ECx - Concentration associated with x% response; EHS - Extremely Hazardous Substance; ELx - Loading rate associated with x% response; EmS - Emergency Schedule; ENCS - Existing and New Chemical Substances (Japan); ErCx - Concentration associated with x% growth rate response; ERG - Emergency Response Guide; GHS - Globally Harmonised System; GLP - Good Laboratory Practice; HMIS - Hazardous Materials Identification System; IARC - International Agency for Research on Cancer; IATA - International Air Transport Association; IBC - International Code for the Construction and Equipment of Ships carrying Dangerous Chemicals in Bulk; IC50 - Half maximal inhibitory concentration; ICAO - International Civil Aviation Organization; IECSC - Inventory of Existing Chemical Substances in China; IMDG - International Maritime Dangerous Goods; IMO - International Maritime Organisation; ISHL - Industrial Safety and Health Law (Japan); ISO - International Organisation for Standardisation; KECI - Korea Existing Chemicals Inventory; LC50 - Lethal Concentration to 50 % of a test population; LD50 - Lethal Dose to 50% of a test population (Median Lethal Dose); MARPOL - International Convention for the Prevention of Pollution from Ships; MSHA - Mine Safety and Health Administration; n.o.s. - Not Otherwise Specified; NFPA - National Fire Protection Association; NO(A)EC - No Observed (Adverse) Effect Concentration; NO(A)EL - No Observed (Adverse) Effect Level; NOELR - No Observable Effect Loading Rate; NTP - National Toxicology Program; NZIoC - New Zealand Inventory of Chemicals; OECD - Organisation for Economic Co-operation and Development; OPPTS - Office of Chemical Safety and Pollution Prevention; PBT - Persistent, Bioaccumulative and Toxic substance; PICCS - Philippines Inventory of Chemicals and Chemical Substances; (Q)SAR - (Quantitative) Structure Activity Relationship; RCRA - Resource Conservation and Recovery Act; REACH - Regulation (EC) No 1907/2006 of the European Parliament and of the Council concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals; RQ - Reportable Quantity; SADT - Self-Accelerating Decomposition Temperature; SARA - Superfund Amendments and Reauthorization Act; SDS - Safety Data Sheet; TCSI - Taiwan Chemical Substance Inventory; TECI - Thailand Existing Chemicals Inventory; TSCA - Toxic Substances Control Act (United States); UN - United Nations; UNRTDG - United Nations Recommendations on the Transport of Dangerous Goods; vPvB - Very Persistent and Very Bioaccumulative

Copyright 2025 Sigma-Aldrich Co. LLC. License granted to make unlimited paper copies for internal use only.

The above information is believed to be correct but does not purport to be shall not be held liable for any damage resulting from handling or from c for additional terms and conditions of sale.

The information is believed to be correct but is not exhaustive and will be used solely as a guideline, which is based on current knowledge of the chemical substance or mixture and is applicable to appropriate safety precautions for the product. It does not represent any guarantee of the properties of the product. Sigma-Aldrich Corporation and its Affiliates shall not be held liable for any damage resulting from handling or from contact with the above product. See www.sigma-aldrich.com and/or the reverse side of invoice or packing slip for additional terms and conditions of sale.

Copyright 2025 Sigma-Aldrich Co. LLC. License granted to make unlimited paper copies for internal use only.

Revision Date : 09/24/2025

The branding on the header and/or footer of this document may temporarily not visually match the product purchased as we transition our branding. However, all of the information in the document regarding the product remains unchanged and matches the product ordered. For further information please contact mlsbranding@sial.com.

US / EN

Kit Components:

20X Wash Buffer Concentrate (Item B)					
Product identifier	Pictogram	Signal Word	Hazard Statements	Precautionary statements	Supplemental information
Sigma - RABWASH5					No hazard pictogram, no signal word, no hazard statement(s), no precautionary statement(s) required.

Phospho-Akt(pSer473)-specific Antibody Concentrate (Item C1)					
Product identifier	Pictogram	Signal Word	Hazard Statements	Precautionary statements	Supplemental information
Sigma - RABA473C1					No hazard pictogram, no signal word, no hazard statement(s), no precautionary statement(s) required.

HRP-conjugated Anti-Rabbit IgG Concentrate (Item D1)					
Product identifier	Pictogram	Signal Word	Hazard Statements	Precautionary statements	Supplemental information
Sigma - RABHRP4					No hazard pictogram, no signal word, no hazard statement(s), no precautionary statement(s) required.

5X Assay Diluent (Item E)					
Product identifier	Pictogram	Signal Word	Hazard Statements	Precautionary statements	Supplemental information
Sigma - RABDIL11					No hazard pictogram, no signal word, no hazard

Sigma - RAB0011

Page 11 of 13

					statement(s), no precautionary statement(s) required.
--	--	--	--	--	---

TMB One-Step Substrate Reagent (Item H)

Product identifier	Pictogram	Signal Word	Hazard Statements	Precautionary statements	Supplemental information
Sigma - RABTMB4		Warning	Suspected of causing cancer.	Obtain special instructions before use. IF exposed or concerned: Get medical advice/ attention. Store locked up. Dispose of contents/ container to an approved waste disposal plant. Do not handle until all safety precautions have been read and understood. Wear protective gloves/ protective clothing/ eye protection/ face protection.	

Phosphorylation ELISA Stop Solution (Item I)

Product identifier	Pictogram	Signal Word	Hazard Statements	Precautionary statements	Supplemental information
Sigma - RABSTOP4		Warning	May be corrosive to metals.	Keep only in original packaging. Absorb spillage to prevent material damage. Store in a corrosion resistant container with a resistant inner liner.	

2X Cell Lysate Buffer (Item J)					
Product identifier	Pictogram	Signal Word	Hazard Statements	Precautionary statements	Supplemental information
Sigma - RABCLB1					No hazard pictogram, no signal word, no hazard statement(s), no precautionary statement(s) required.

Phospho-Akt (pSer473) Lyophilized Positive Control Sample (Item K)					
Product identifier	Pictogram	Signal Word	Hazard Statements	Precautionary statements	Supplemental information
Sigma - RABA473K					No hazard pictogram, no signal word, no hazard statement(s), no precautionary statement(s) required.