

SAFETY DATA SHEET

Enterprise Edition Caffeine Standards Kit

Section 1. Identification

Product identifier	: Enterprise Edition Caffeine Standards Kit	
Part no. (chemical kit)	: 5190-0488	
Part no.	Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	5190-0488-1
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	5190-0488-2
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	5190-0488-3
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	5190-0488-4
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	5190-0488-5
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	5190-0488-6
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	5190-0488-7
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	5190-0488-8

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

Identified uses	: Reagents and Standards for Analytical Chemistry Laboratory Use	
	Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	1 x 2 ml
	Enterprise Caffeine Standard – Cal #2 (1 ug/ mL)	1 x 2 ml
	Enterprise Caffeine Standard – Cal #3 (2 ug/ mL)	1 x 2 ml
	Enterprise Caffeine Standard – Cal #4 (5 ug/ mL)	1 x 2 ml
	Enterprise Caffeine Standard – Cal #5 (25 ug/ mL)	2 x 2 ml
	Enterprise Caffeine Standard – Cal #6 (50 ug/ mL)	1 x 2 ml
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	1 x 2 ml
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	1 x 2 ml

Supplier/Manufacturer : Agilent Technologies Australia Pty Ltd
679 Springvale Road
Mulgrave
Victoria 3170, Australia
1800 802 402

Emergency telephone number (with hours of operation) : CHEMTREC®: +(61)-290372994

Section 2. Hazard(s) identification

Classification of the substance or mixture

Not classified.

GHS label elements

Signal word	:	Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	No signal word.
		Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	No signal word.
		Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	No signal word.
		Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	No signal word.
		Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	No signal word.
		Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	No signal word.
		Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	No signal word.
		Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	No signal word.
Hazard statements	:	Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	No known significant effects or critical hazards.
		Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	No known significant effects or critical hazards.
		Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	No known significant effects or critical hazards.
		Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	No known significant effects or critical hazards.
		Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	No known significant effects or critical hazards.
		Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	No known significant effects or critical hazards.
		Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	No known significant effects or critical hazards.
		Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	No known significant effects or critical hazards.
Precautionary statements			
Prevention	:	Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Not applicable.
		Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Not applicable.
		Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Not applicable.
		Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Not applicable.
		Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Not applicable.
		Enterprise Caffeine Standard – Cal #6 (50 ug/	Not applicable.

Section 2. Hazard(s) identification

	mL)	
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Not applicable.
Response	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Not applicable.
Storage	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Not applicable.
Disposal	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Not applicable.
	Enterprise Caffeine	Not applicable.

Section 2. Hazard(s) identification

Standard – Cal #6 (50 ug/
mL)
Enterprise Caffeine Not applicable.
Standard – Cal #7 (100 ug/
mL)
Enterprise Caffeine Not applicable.
Standard – Cal #8 (200 ug/
mL)

Supplemental label elements

Additional warning phrases :

Enterprise Caffeine Not applicable.
Standard – Cal #1 (0.5 ug/
mL)
Enterprise Caffeine Not applicable.
Standard – Cal #2 (1 ug/mL)
Enterprise Caffeine Not applicable.
Standard – Cal #3 (2 ug/mL)
Enterprise Caffeine Not applicable.
Standard – Cal #4 (5 ug/mL)
Enterprise Caffeine Not applicable.
Standard – Cal #5 (25 ug/
mL)
Enterprise Caffeine Not applicable.
Standard – Cal #6 (50 ug/
mL)
Enterprise Caffeine Not applicable.
Standard – Cal #7 (100 ug/
mL)
Enterprise Caffeine Not applicable.
Standard – Cal #8 (200 ug/
mL)

Other hazards which do not result in classification :

Enterprise Caffeine None known.
Standard – Cal #1 (0.5 ug/
mL)
Enterprise Caffeine None known.
Standard – Cal #2 (1 ug/mL)
Enterprise Caffeine None known.
Standard – Cal #3 (2 ug/mL)
Enterprise Caffeine None known.
Standard – Cal #4 (5 ug/mL)
Enterprise Caffeine None known.
Standard – Cal #5 (25 ug/
mL)
Enterprise Caffeine None known.
Standard – Cal #6 (50 ug/
mL)
Enterprise Caffeine None known.
Standard – Cal #7 (100 ug/
mL)
Enterprise Caffeine None known.
Standard – Cal #8 (200 ug/
mL)

Section 3. Composition and ingredient information

Substance/mixture :

Enterprise Caffeine Mixture
Standard – Cal #1 (0.5 ug/
mL)
Enterprise Caffeine Mixture
Standard – Cal #2 (1 ug/mL)
Enterprise Caffeine Mixture
Standard – Cal #3 (2 ug/mL)

Section 3. Composition and ingredient information

Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Mixture
Enterprise Caffeine Standard – Cal #5 (25 ug/ mL)	Mixture
Enterprise Caffeine Standard – Cal #6 (50 ug/ mL)	Mixture
Enterprise Caffeine Standard – Cal #7 (100 ug/ mL)	Mixture
Enterprise Caffeine Standard – Cal #8 (200 ug/ mL)	Mixture

[CAS number/other identifiers](#)

There are no ingredients present which, within the current knowledge of the supplier and in the concentrations applicable, are classified and hence require reporting in this section.

The total concentration of ingredients in this product, reported or not in this section, is 100%.

Section 4. First aid measures

[Description of necessary first aid measures](#)

Eye contact	:	Enterprise Caffeine Standard – Cal #1 (0.5 ug/ mL)	Immediately flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. Check for and remove any contact lenses. Get medical attention if irritation occurs.
		Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Immediately flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. Check for and remove any contact lenses. Get medical attention if irritation occurs.
		Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Immediately flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. Check for and remove any contact lenses. Get medical attention if irritation occurs.
		Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Immediately flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. Check for and remove any contact lenses. Get medical attention if irritation occurs.
		Enterprise Caffeine Standard – Cal #5 (25 ug/ mL)	Immediately flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. Check for and remove any contact lenses. Get medical attention if irritation occurs.
		Enterprise Caffeine Standard – Cal #6 (50 ug/ mL)	Immediately flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. Check for and remove any contact lenses. Get medical attention if irritation occurs.
		Enterprise Caffeine Standard – Cal #7 (100 ug/ mL)	Immediately flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. Check for and remove any contact lenses. Get medical attention if irritation occurs.
		Enterprise Caffeine Standard – Cal #8 (200 ug/ mL)	Immediately flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. Check for and remove any contact lenses. Get medical attention if irritation occurs.

Section 4. First aid measures

Inhalation	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Remove victim to fresh air and keep at rest in a position comfortable for breathing. Get medical attention if symptoms occur.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Remove victim to fresh air and keep at rest in a position comfortable for breathing. Get medical attention if symptoms occur.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Remove victim to fresh air and keep at rest in a position comfortable for breathing. Get medical attention if symptoms occur.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Remove victim to fresh air and keep at rest in a position comfortable for breathing. Get medical attention if symptoms occur.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Remove victim to fresh air and keep at rest in a position comfortable for breathing. Get medical attention if symptoms occur.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Remove victim to fresh air and keep at rest in a position comfortable for breathing. Get medical attention if symptoms occur.
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Remove victim to fresh air and keep at rest in a position comfortable for breathing. Get medical attention if symptoms occur.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Remove victim to fresh air and keep at rest in a position comfortable for breathing. Get medical attention if symptoms occur.
Skin contact	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Flush contaminated skin with plenty of water. Remove contaminated clothing and shoes. Get medical attention if symptoms occur.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Flush contaminated skin with plenty of water. Remove contaminated clothing and shoes. Get medical attention if symptoms occur.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Flush contaminated skin with plenty of water. Remove contaminated clothing and shoes. Get medical attention if symptoms occur.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Flush contaminated skin with plenty of water. Remove contaminated clothing and shoes. Get medical attention if symptoms occur.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Flush contaminated skin with plenty of water. Remove contaminated clothing and shoes. Get medical attention if symptoms occur.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Flush contaminated skin with plenty of water. Remove contaminated clothing and shoes. Get medical attention if symptoms occur.
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Flush contaminated skin with plenty of water. Remove contaminated clothing and shoes. Get medical attention if symptoms occur.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Flush contaminated skin with plenty of water. Remove contaminated clothing and shoes. Get medical attention if symptoms occur.
Ingestion	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Wash out mouth with water. If material has been swallowed and the exposed person is conscious, give small quantities of water to drink. Do not induce vomiting unless directed to do so by medical personnel. Get medical attention if symptoms occur.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Wash out mouth with water. If material has been swallowed and the exposed person is conscious, give small quantities of water to drink. Do not induce vomiting unless directed to do so by medical personnel. Get medical attention if symptoms occur.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Wash out mouth with water. If material has been swallowed and the exposed person is conscious, give small quantities of water to drink. Do not induce vomiting unless directed to do so by medical personnel. Get medical attention if symptoms occur.

Section 4. First aid measures

Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Wash out mouth with water. If material has been swallowed and the exposed person is conscious, give small quantities of water to drink. Do not induce vomiting unless directed to do so by medical personnel. Get medical attention if symptoms occur.
Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Wash out mouth with water. If material has been swallowed and the exposed person is conscious, give small quantities of water to drink. Do not induce vomiting unless directed to do so by medical personnel. Get medical attention if symptoms occur.
Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Wash out mouth with water. If material has been swallowed and the exposed person is conscious, give small quantities of water to drink. Do not induce vomiting unless directed to do so by medical personnel. Get medical attention if symptoms occur.
Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Wash out mouth with water. If material has been swallowed and the exposed person is conscious, give small quantities of water to drink. Do not induce vomiting unless directed to do so by medical personnel. Get medical attention if symptoms occur.
Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Wash out mouth with water. If material has been swallowed and the exposed person is conscious, give small quantities of water to drink. Do not induce vomiting unless directed to do so by medical personnel. Get medical attention if symptoms occur.

Most important symptoms/effects, acute and delayed

Potential acute health effects

Eye contact

: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	No known significant effects or critical hazards.
Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	No known significant effects or critical hazards.
Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	No known significant effects or critical hazards.
Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	No known significant effects or critical hazards.
Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	No known significant effects or critical hazards.
Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	No known significant effects or critical hazards.
Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	No known significant effects or critical hazards.
Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	No known significant effects or critical hazards.

Inhalation

: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	No known significant effects or critical hazards.
Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	No known significant effects or critical hazards.
Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	No known significant effects or critical hazards.
Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	No known significant effects or critical hazards.
Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	No known significant effects or critical hazards.
Enterprise Caffeine	No known significant effects or critical hazards.

Section 4. First aid measures

	Standard – Cal #6 (50 ug/mL)	
	Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #7 (100 ug/mL)	
	Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #8 (200 ug/mL)	
Skin contact	: Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #1 (0.5 ug/mL)	
	Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #2 (1 ug/mL)	
	Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #3 (2 ug/mL)	
	Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #4 (5 ug/mL)	
	Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #5 (25 ug/mL)	
	Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #6 (50 ug/mL)	
	Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #7 (100 ug/mL)	
	Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #8 (200 ug/mL)	
Ingestion	: Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #1 (0.5 ug/mL)	
	Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #2 (1 ug/mL)	
	Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #3 (2 ug/mL)	
	Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #4 (5 ug/mL)	
	Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #5 (25 ug/mL)	
	Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #6 (50 ug/mL)	
	Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #7 (100 ug/mL)	
	Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #8 (200 ug/mL)	
Over-exposure signs/symptoms		
Eye contact	: Enterprise Caffeine	No specific data.
	Standard – Cal #1 (0.5 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #2 (1 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #3 (2 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #4 (5 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #5 (25 ug/	

Section 4. First aid measures

	mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #6 (50 ug/	
	mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #7 (100 ug/	
	mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #8 (200 ug/	
	mL)	
Inhalation	:	Enterprise Caffeine
		Standard – Cal #1 (0.5 ug/
		mL)
		Enterprise Caffeine
		Standard – Cal #2 (1 ug/mL)
		Enterprise Caffeine
		Standard – Cal #3 (2 ug/mL)
		Enterprise Caffeine
		Standard – Cal #4 (5 ug/mL)
		Enterprise Caffeine
		Standard – Cal #5 (25 ug/
		mL)
		Enterprise Caffeine
		Standard – Cal #6 (50 ug/
		mL)
		Enterprise Caffeine
		Standard – Cal #7 (100 ug/
		mL)
		Enterprise Caffeine
		Standard – Cal #8 (200 ug/
		mL)
Skin contact	:	Enterprise Caffeine
		Standard – Cal #1 (0.5 ug/
		mL)
		Enterprise Caffeine
		Standard – Cal #2 (1 ug/mL)
		Enterprise Caffeine
		Standard – Cal #3 (2 ug/mL)
		Enterprise Caffeine
		Standard – Cal #4 (5 ug/mL)
		Enterprise Caffeine
		Standard – Cal #5 (25 ug/
		mL)
		Enterprise Caffeine
		Standard – Cal #6 (50 ug/
		mL)
		Enterprise Caffeine
		Standard – Cal #7 (100 ug/
		mL)
		Enterprise Caffeine
		Standard – Cal #8 (200 ug/
		mL)
Ingestion	:	Enterprise Caffeine
		Standard – Cal #1 (0.5 ug/
		mL)
		Enterprise Caffeine
		Standard – Cal #2 (1 ug/mL)
		Enterprise Caffeine
		Standard – Cal #3 (2 ug/mL)
		Enterprise Caffeine
		Standard – Cal #4 (5 ug/mL)
		Enterprise Caffeine
		Standard – Cal #5 (25 ug/

Section 4. First aid measures

mL) Enterprise Caffeine Standard – Cal #6 (50 ug/ mL)	No specific data.
Enterprise Caffeine Standard – Cal #7 (100 ug/ mL)	No specific data.
Enterprise Caffeine Standard – Cal #8 (200 ug/ mL)	No specific data.

Indication of immediate medical attention and special treatment needed, if necessary

Notes to physician	:	Enterprise Caffeine Standard – Cal #1 (0.5 ug/ mL)	Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.
		Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.
		Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.
		Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.
		Enterprise Caffeine Standard – Cal #5 (25 ug/ mL)	Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.
		Enterprise Caffeine Standard – Cal #6 (50 ug/ mL)	Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.
		Enterprise Caffeine Standard – Cal #7 (100 ug/ mL)	Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.
		Enterprise Caffeine Standard – Cal #8 (200 ug/ mL)	Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.
Specific treatments	:	Enterprise Caffeine Standard – Cal #1 (0.5 ug/ mL)	No specific treatment.
		Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	No specific treatment.
		Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	No specific treatment.
		Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	No specific treatment.
		Enterprise Caffeine Standard – Cal #5 (25 ug/ mL)	No specific treatment.
		Enterprise Caffeine Standard – Cal #6 (50 ug/ mL)	No specific treatment.
		Enterprise Caffeine Standard – Cal #7 (100 ug/ mL)	No specific treatment.
		Enterprise Caffeine Standard – Cal #8 (200 ug/ mL)	No specific treatment.

Section 4. First aid measures

Protection of first-aiders	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	No action shall be taken involving any personal risk or without suitable training.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	No action shall be taken involving any personal risk or without suitable training.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	No action shall be taken involving any personal risk or without suitable training.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	No action shall be taken involving any personal risk or without suitable training.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	No action shall be taken involving any personal risk or without suitable training.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	No action shall be taken involving any personal risk or without suitable training.
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	No action shall be taken involving any personal risk or without suitable training.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	No action shall be taken involving any personal risk or without suitable training.

See toxicological information (Section 11)

Section 5. Firefighting measures

Extinguishing media

Suitable extinguishing media	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Use an extinguishing agent suitable for the surrounding fire.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Use an extinguishing agent suitable for the surrounding fire.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Use an extinguishing agent suitable for the surrounding fire.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Use an extinguishing agent suitable for the surrounding fire.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Use an extinguishing agent suitable for the surrounding fire.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Use an extinguishing agent suitable for the surrounding fire.
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Use an extinguishing agent suitable for the surrounding fire.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Use an extinguishing agent suitable for the surrounding fire.
Unsuitable extinguishing media	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	None known.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	None known.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	None known.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	None known.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	None known.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	None known.

Section 5. Firefighting measures

	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	None known.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	None known.
Specific hazards arising from the chemical	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	In a fire or if heated, a pressure increase will occur and the container may burst.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	In a fire or if heated, a pressure increase will occur and the container may burst.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	In a fire or if heated, a pressure increase will occur and the container may burst.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	In a fire or if heated, a pressure increase will occur and the container may burst.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	In a fire or if heated, a pressure increase will occur and the container may burst.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	In a fire or if heated, a pressure increase will occur and the container may burst.
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	In a fire or if heated, a pressure increase will occur and the container may burst.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	In a fire or if heated, a pressure increase will occur and the container may burst.
Hazardous thermal decomposition products	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	No specific data.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	No specific data.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	No specific data.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	No specific data.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	No specific data.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	No specific data.
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	No specific data.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	No specific data.
Special protective actions for fire-fighters	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.

Section 5. Firefighting measures

Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.
Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.
Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.
Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.
Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.
Special protective equipment for fire-fighters :	
Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.
Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.
Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.
Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.
Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.
Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.
Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.
Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.

Section 6. Accidental release measures

Personal precautions, protective equipment and emergency procedures

For non-emergency personnel :	Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilled material. Put on appropriate personal protective equipment.
	Enterprise Caffeine	No action shall be taken involving any personal risk

Section 6. Accidental release measures

Standard – Cal #2 (1 ug/mL)	Enterprise Caffeine	or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilt material. Put on appropriate personal protective equipment.
Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Enterprise Caffeine	No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilt material. Put on appropriate personal protective equipment.
Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Enterprise Caffeine	No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilt material. Put on appropriate personal protective equipment.
Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Enterprise Caffeine	No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilt material. Put on appropriate personal protective equipment.
Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Enterprise Caffeine	No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilt material. Put on appropriate personal protective equipment.
Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Enterprise Caffeine	No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilt material. Put on appropriate personal protective equipment.
Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Enterprise Caffeine	No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilt material. Put on appropriate personal protective equipment.
For emergency responders : Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Enterprise Caffeine	If specialised clothing is required to deal with the spillage, take note of any information in Section 8 on suitable and unsuitable materials. See also the information in "For non-emergency personnel".
Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Enterprise Caffeine	If specialised clothing is required to deal with the spillage, take note of any information in Section 8 on suitable and unsuitable materials. See also the information in "For non-emergency personnel".
Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Enterprise Caffeine	If specialised clothing is required to deal with the spillage, take note of any information in Section 8 on suitable and unsuitable materials. See also the information in "For non-emergency personnel".
Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Enterprise Caffeine	If specialised clothing is required to deal with the spillage, take note of any information in Section 8 on suitable and unsuitable materials. See also the information in "For non-emergency personnel".
Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Enterprise Caffeine	If specialised clothing is required to deal with the spillage, take note of any information in Section 8 on suitable and unsuitable materials. See also the information in "For non-emergency personnel".
Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Enterprise Caffeine	If specialised clothing is required to deal with the spillage, take note of any information in Section 8 on suitable and unsuitable materials. See also the information in "For non-emergency personnel".

Section 6. Accidental release measures

	mL)	suitable and unsuitable materials. See also the information in "For non-emergency personnel".
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	If specialised clothing is required to deal with the spillage, take note of any information in Section 8 on suitable and unsuitable materials. See also the information in "For non-emergency personnel".
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	If specialised clothing is required to deal with the spillage, take note of any information in Section 8 on suitable and unsuitable materials. See also the information in "For non-emergency personnel".
Environmental precautions	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Avoid dispersal of spilt material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Avoid dispersal of spilt material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Avoid dispersal of spilt material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Avoid dispersal of spilt material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Avoid dispersal of spilt material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Avoid dispersal of spilt material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Avoid dispersal of spilt material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Avoid dispersal of spilt material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).

Methods and material for containment and cleaning up

Methods for cleaning up	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Stop leak if without risk. Move containers from spill area. Dilute with water and mop up if water-soluble. Alternatively, or if water-insoluble, absorb with an inert dry material and place in an appropriate waste disposal container. Dispose of via a licensed waste disposal contractor.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Stop leak if without risk. Move containers from spill area. Dilute with water and mop up if water-soluble. Alternatively, or if water-insoluble, absorb with an

Section 6. Accidental release measures

Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	inert dry material and place in an appropriate waste disposal container. Dispose of via a licensed waste disposal contractor. Stop leak if without risk. Move containers from spill area. Dilute with water and mop up if water-soluble. Alternatively, or if water-insoluble, absorb with an inert dry material and place in an appropriate waste disposal container. Dispose of via a licensed waste disposal contractor.
Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Stop leak if without risk. Move containers from spill area. Dilute with water and mop up if water-soluble. Alternatively, or if water-insoluble, absorb with an inert dry material and place in an appropriate waste disposal container. Dispose of via a licensed waste disposal contractor.
Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Stop leak if without risk. Move containers from spill area. Dilute with water and mop up if water-soluble. Alternatively, or if water-insoluble, absorb with an inert dry material and place in an appropriate waste disposal container. Dispose of via a licensed waste disposal contractor.
Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Stop leak if without risk. Move containers from spill area. Dilute with water and mop up if water-soluble. Alternatively, or if water-insoluble, absorb with an inert dry material and place in an appropriate waste disposal container. Dispose of via a licensed waste disposal contractor.
Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Stop leak if without risk. Move containers from spill area. Dilute with water and mop up if water-soluble. Alternatively, or if water-insoluble, absorb with an inert dry material and place in an appropriate waste disposal container. Dispose of via a licensed waste disposal contractor.
Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Stop leak if without risk. Move containers from spill area. Dilute with water and mop up if water-soluble. Alternatively, or if water-insoluble, absorb with an inert dry material and place in an appropriate waste disposal container. Dispose of via a licensed waste disposal contractor.

Section 7. Handling and storage

Precautions for safe handling

Protective measures	:	Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Put on appropriate personal protective equipment (see Section 8).
		Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Put on appropriate personal protective equipment (see Section 8).
		Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Put on appropriate personal protective equipment (see Section 8).
		Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Put on appropriate personal protective equipment (see Section 8).
		Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Put on appropriate personal protective equipment (see Section 8).
		Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Put on appropriate personal protective equipment (see Section 8).
		Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Put on appropriate personal protective equipment (see Section 8).
		Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Put on appropriate personal protective equipment (see Section 8).

Section 7. Handling and storage

Advice on general occupational hygiene

mL)

: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)

Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. See also Section 8 for additional information on hygiene measures.

Enterprise Caffeine Standard – Cal #2 (1 ug/mL)

Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. See also Section 8 for additional information on hygiene measures.

Enterprise Caffeine Standard – Cal #3 (2 ug/mL)

Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. See also Section 8 for additional information on hygiene measures.

Enterprise Caffeine Standard – Cal #4 (5 ug/mL)

Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. See also Section 8 for additional information on hygiene measures.

Enterprise Caffeine Standard – Cal #5 (25 ug/mL)

Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. See also Section 8 for additional information on hygiene measures.

Enterprise Caffeine Standard – Cal #6 (50 ug/mL)

Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. See also Section 8 for additional information on hygiene measures.

Enterprise Caffeine Standard – Cal #7 (100 ug/mL)

Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. See also Section 8 for additional information on hygiene measures.

Enterprise Caffeine Standard – Cal #8 (200 ug/mL)

Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. See also Section 8 for additional information on hygiene measures.

Section 7. Handling and storage

Conditions for safe storage, including any incompatibilities	Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabelled containers. Use appropriate containment to avoid environmental contamination. See Section 10 for incompatible materials before handling or use.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabelled containers. Use appropriate containment to avoid environmental contamination. See Section 10 for incompatible materials before handling or use.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabelled containers. Use appropriate containment to avoid environmental contamination. See Section 10 for incompatible materials before handling or use.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabelled containers. Use appropriate containment to avoid environmental contamination. See Section 10 for incompatible materials before handling or use.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabelled containers. Use appropriate containment to avoid environmental contamination. See Section 10 for incompatible materials before handling or use.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabelled

Section 7. Handling and storage

Enterprise Caffeine
Standard – Cal #7 (100 ug/
mL)

containers. Use appropriate containment to avoid environmental contamination. See Section 10 for incompatible materials before handling or use. Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabelled containers. Use appropriate containment to avoid environmental contamination. See Section 10 for incompatible materials before handling or use. Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabelled containers. Use appropriate containment to avoid environmental contamination. See Section 10 for incompatible materials before handling or use.

Enterprise Caffeine
Standard – Cal #8 (200 ug/
mL)

containers. Use appropriate containment to avoid environmental contamination. See Section 10 for incompatible materials before handling or use. Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabelled containers. Use appropriate containment to avoid environmental contamination. See Section 10 for incompatible materials before handling or use.

Section 8. Exposure controls and personal protection

Control parameters

Occupational exposure limits

None.

Biological exposure indices

No exposure indices known.

Appropriate engineering controls

: Good general ventilation should be sufficient to control worker exposure to airborne contaminants.

Environmental exposure controls

: Emissions from ventilation or work process equipment should be checked to ensure they comply with the requirements of environmental protection legislation. In some cases, fume scrubbers, filters or engineering modifications to the process equipment will be necessary to reduce emissions to acceptable levels.

Individual protection measures

Hygiene measures

: Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period. Appropriate techniques should be used to remove potentially contaminated clothing. Wash contaminated clothing before reusing. Ensure that eyewash stations and safety showers are close to the workstation location.

Eye/face protection

: Safety eyewear complying with an approved standard should be used when a risk assessment indicates this is necessary to avoid exposure to liquid splashes, mists, gases or dusts. If contact is possible, the following protection should be worn, unless the assessment indicates a higher degree of protection: safety glasses with side-shields.

Skin protection

Hand protection

: Chemical-resistant, impervious gloves complying with an approved standard should be worn at all times when handling chemical products if a risk assessment indicates this is necessary.

Section 8. Exposure controls and personal protection

- Body protection** : Personal protective equipment for the body should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.
- Other skin protection** : Appropriate footwear and any additional skin protection measures should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.
- Respiratory protection** : Based on the hazard and potential for exposure, select a respirator that meets the appropriate standard or certification. Respirators must be used according to a respiratory protection program to ensure proper fitting, training, and other important aspects of use.

Section 9. Physical and chemical properties and safety characteristics

The conditions of measurement of all properties are at standard temperature and pressure unless otherwise indicated.

Appearance

- Physical state**
- | | |
|---|---------|
| Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL) | Liquid. |
| Enterprise Caffeine Standard – Cal #2 (1 ug/mL) | Liquid. |
| Enterprise Caffeine Standard – Cal #3 (2 ug/mL) | Liquid. |
| Enterprise Caffeine Standard – Cal #4 (5 ug/mL) | Liquid. |
| Enterprise Caffeine Standard – Cal #5 (25 ug/mL) | Liquid. |
| Enterprise Caffeine Standard – Cal #6 (50 ug/mL) | Liquid. |
| Enterprise Caffeine Standard – Cal #7 (100 ug/mL) | Liquid. |
| Enterprise Caffeine Standard – Cal #8 (200 ug/mL) | Liquid. |
- Colour**
- | | |
|---|-------------|
| Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL) | Colourless. |
| Enterprise Caffeine Standard – Cal #2 (1 ug/mL) | Colourless. |
| Enterprise Caffeine Standard – Cal #3 (2 ug/mL) | Colourless. |
| Enterprise Caffeine Standard – Cal #4 (5 ug/mL) | Colourless. |
| Enterprise Caffeine Standard – Cal #5 (25 ug/mL) | Colourless. |
| Enterprise Caffeine Standard – Cal #6 (50 ug/mL) | Colourless. |
| Enterprise Caffeine Standard – Cal #7 (100 ug/mL) | Colourless. |
| Enterprise Caffeine Standard – Cal #8 (200 ug/mL) | Colourless. |

Section 9. Physical and chemical properties and safety characteristics

Odour	:	Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Not available.	
		Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Not available.	
		Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Not available.	
		Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Not available.	
		Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Not available.	
		Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Not available.	
		Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Not available.	
		Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Not available.	
	Odour threshold	:	Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Not available.
			Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Not available.
			Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Not available.
			Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Not available.
			Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Not available.
			Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Not available.
			Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Not available.
			Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Not available.
pH		:	Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Not available.
			Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Not available.
			Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Not available.
			Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Not available.
			Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Not available.
			Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Not available.
			Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Not available.
			Enterprise Caffeine	Not available.

Section 9. Physical and chemical properties and safety characteristics

	Standard – Cal #8 (200 ug/mL)	
Melting point/freezing point	: Enterprise Caffeine	0°C (32°F)
	Standard – Cal #1 (0.5 ug/mL)	
	Enterprise Caffeine	0°C (32°F)
	Standard – Cal #2 (1 ug/mL)	
	Enterprise Caffeine	0°C (32°F)
	Standard – Cal #3 (2 ug/mL)	
	Enterprise Caffeine	0°C (32°F)
	Standard – Cal #4 (5 ug/mL)	
	Enterprise Caffeine	0°C (32°F)
	Standard – Cal #5 (25 ug/mL)	
	Enterprise Caffeine	0°C (32°F)
	Standard – Cal #6 (50 ug/mL)	
	Enterprise Caffeine	0°C (32°F)
	Standard – Cal #7 (100 ug/mL)	
	Enterprise Caffeine	0°C (32°F)
	Standard – Cal #8 (200 ug/mL)	
Boiling point, initial boiling point, and boiling range	: Enterprise Caffeine	100°C (212°F)
	Standard – Cal #1 (0.5 ug/mL)	
	Enterprise Caffeine	100°C (212°F)
	Standard – Cal #2 (1 ug/mL)	
	Enterprise Caffeine	100°C (212°F)
	Standard – Cal #3 (2 ug/mL)	
	Enterprise Caffeine	100°C (212°F)
	Standard – Cal #4 (5 ug/mL)	
	Enterprise Caffeine	100°C (212°F)
	Standard – Cal #5 (25 ug/mL)	
	Enterprise Caffeine	100°C (212°F)
	Standard – Cal #6 (50 ug/mL)	
	Enterprise Caffeine	100°C (212°F)
	Standard – Cal #7 (100 ug/mL)	
	Enterprise Caffeine	100°C (212°F)
	Standard – Cal #8 (200 ug/mL)	
Flash point	: Enterprise Caffeine	Not available.
	Standard – Cal #1 (0.5 ug/mL)	
	Enterprise Caffeine	Not available.
	Standard – Cal #2 (1 ug/mL)	
	Enterprise Caffeine	Not available.
	Standard – Cal #3 (2 ug/mL)	
	Enterprise Caffeine	Not available.
	Standard – Cal #4 (5 ug/mL)	
	Enterprise Caffeine	Not available.
	Standard – Cal #5 (25 ug/mL)	
	Enterprise Caffeine	Not available.
	Standard – Cal #6 (50 ug/mL)	
	Enterprise Caffeine	Not available.
	Standard – Cal #7 (100 ug/mL)	

Section 9. Physical and chemical properties and safety characteristics

	mL)	
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Not available.
Evaporation rate	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Not available.
Flammability	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Not applicable.
Lower and upper explosion limit/flammability limit	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Not available.

Section 9. Physical and chemical properties and safety characteristics

	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Not available.
Vapour pressure	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	2.3 kPa (17.542 mm Hg)
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	2.3 kPa (17.542 mm Hg)
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	2.3 kPa (17.542 mm Hg)
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	2.3 kPa (17.542 mm Hg)
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	2.3 kPa (17.452 mm Hg)
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	2.3 kPa (17.542 mm Hg)
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	2.3 kPa (17.542 mm Hg)
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	2.3 kPa (17.542 mm Hg)
Relative vapour density	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Not available.
Relative density	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	1
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	1
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	1
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	1
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	1
	Enterprise Caffeine	1

Section 9. Physical and chemical properties and safety characteristics

Standard – Cal #6 (50 ug/
mL)
Enterprise Caffeine 1
Standard – Cal #7 (100 ug/
mL)
Enterprise Caffeine 1
Standard – Cal #8 (200 ug/
mL)

Solubility(ies)

Media	Result
Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL) water	Soluble
Enterprise Caffeine Standard – Cal #2 (1 ug/mL) water	Soluble
Enterprise Caffeine Standard – Cal #3 (2 ug/mL) water	Soluble
Enterprise Caffeine Standard – Cal #4 (5 ug/mL) water	Soluble
Enterprise Caffeine Standard – Cal #5 (25 ug/mL) water	Soluble
Enterprise Caffeine Standard – Cal #6 (50 ug/mL) water	Soluble
Enterprise Caffeine Standard – Cal #7 (100 ug/mL) water	Soluble
Enterprise Caffeine Standard – Cal #8 (200 ug/mL) water	Soluble

Partition coefficient: n-octanol/water

Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL) Not applicable.
Enterprise Caffeine Standard – Cal #2 (1 ug/mL) Not applicable.
Enterprise Caffeine Standard – Cal #3 (2 ug/mL) Not applicable.
Enterprise Caffeine Standard – Cal #4 (5 ug/mL) Not applicable.
Enterprise Caffeine Standard – Cal #5 (25 ug/mL) Not applicable.
Enterprise Caffeine Standard – Cal #6 (50 ug/mL) Not applicable.
Enterprise Caffeine Standard – Cal #7 (100 ug/mL) Not applicable.
Enterprise Caffeine Standard – Cal #8 (200 ug/mL) Not applicable.

Auto-ignition temperature

Not available.

Section 9. Physical and chemical properties and safety characteristics

Decomposition temperature	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Not available.

Viscosity	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Not available.

Particle characteristics

Median particle size	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Not applicable.
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Not applicable.

Section 9. Physical and chemical properties and safety characteristics

Enterprise Caffeine Standard – Cal #8 (200 ug/mL) Not applicable.

Section 10. Stability and reactivity

Reactivity	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	No specific test data related to reactivity available for this product or its ingredients.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	No specific test data related to reactivity available for this product or its ingredients.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	No specific test data related to reactivity available for this product or its ingredients.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	No specific test data related to reactivity available for this product or its ingredients.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	No specific test data related to reactivity available for this product or its ingredients.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	No specific test data related to reactivity available for this product or its ingredients.
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	No specific test data related to reactivity available for this product or its ingredients.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	No specific test data related to reactivity available for this product or its ingredients.
Chemical stability	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	The product is stable.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	The product is stable.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	The product is stable.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	The product is stable.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	The product is stable.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	The product is stable.
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	The product is stable.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	The product is stable.
Possibility of hazardous reactions	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Under normal conditions of storage and use, hazardous reactions will not occur.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Under normal conditions of storage and use, hazardous reactions will not occur.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Under normal conditions of storage and use, hazardous reactions will not occur.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Under normal conditions of storage and use, hazardous reactions will not occur.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Under normal conditions of storage and use, hazardous reactions will not occur.

Section 10. Stability and reactivity

mL) Enterprise Caffeine Standard – Cal #6 (50 ug/ mL)	Under normal conditions of storage and use, hazardous reactions will not occur.
Enterprise Caffeine Standard – Cal #7 (100 ug/ mL)	Under normal conditions of storage and use, hazardous reactions will not occur.
Enterprise Caffeine Standard – Cal #8 (200 ug/ mL)	Under normal conditions of storage and use, hazardous reactions will not occur.

Conditions to avoid

: Enterprise Caffeine Standard – Cal #1 (0.5 ug/ mL)	No specific data.
Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	No specific data.
Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	No specific data.
Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	No specific data.
Enterprise Caffeine Standard – Cal #5 (25 ug/ mL)	No specific data.
Enterprise Caffeine Standard – Cal #6 (50 ug/ mL)	No specific data.
Enterprise Caffeine Standard – Cal #7 (100 ug/ mL)	No specific data.
Enterprise Caffeine Standard – Cal #8 (200 ug/ mL)	No specific data.

Incompatible materials

: Enterprise Caffeine Standard – Cal #1 (0.5 ug/ mL)	May react or be incompatible with oxidising materials.
Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	May react or be incompatible with oxidising materials.
Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	May react or be incompatible with oxidising materials.
Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	May react or be incompatible with oxidising materials.
Enterprise Caffeine Standard – Cal #5 (25 ug/ mL)	May react or be incompatible with oxidising materials.
Enterprise Caffeine Standard – Cal #6 (50 ug/ mL)	May react or be incompatible with oxidising materials.
Enterprise Caffeine Standard – Cal #7 (100 ug/ mL)	May react or be incompatible with oxidising materials.
Enterprise Caffeine Standard – Cal #8 (200 ug/ mL)	May react or be incompatible with oxidising materials.

Hazardous decomposition products

: Enterprise Caffeine Standard – Cal #1 (0.5 ug/ mL)	Under normal conditions of storage and use, hazardous decomposition products should not be produced.
Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Under normal conditions of storage and use, hazardous decomposition products should not be produced.
Enterprise Caffeine	Under normal conditions of storage and use,

Section 10. Stability and reactivity

Standard – Cal #3 (2 ug/mL)	hazardous decomposition products should not be produced.
Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Under normal conditions of storage and use, hazardous decomposition products should not be produced.
Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Under normal conditions of storage and use, hazardous decomposition products should not be produced.
Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	Under normal conditions of storage and use, hazardous decomposition products should not be produced.
Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	Under normal conditions of storage and use, hazardous decomposition products should not be produced.
Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	Under normal conditions of storage and use, hazardous decomposition products should not be produced.

Section 11. Toxicological information

Information on toxicological effects

Acute toxicity

Not available.

Irritation/Corrosion

Not available.

Sensitisation

Not available.

Mutagenicity

Conclusion/Summary : Not available.

Carcinogenicity

Conclusion/Summary : Not available.

Reproductive toxicity

Conclusion/Summary : Not available.

Teratogenicity

Conclusion/Summary : Not available.

Specific target organ toxicity (single exposure)

Not available.

Specific target organ toxicity (repeated exposure)

Not available.

Aspiration hazard

Not available.

Information on likely routes of exposure	Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	Not available.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	Not available.

Section 11. Toxicological information

Enterprise Caffeine
Standard – Cal #6 (50 ug/
mL) Not available.

Enterprise Caffeine
Standard – Cal #7 (100 ug/
mL) Not available.

Enterprise Caffeine
Standard – Cal #8 (200 ug/
mL) Not available.

Potential acute health effects

Eye contact

: Enterprise Caffeine
Standard – Cal #1 (0.5 ug/
mL) No known significant effects or critical hazards.

Enterprise Caffeine
Standard – Cal #2 (1 ug/mL) No known significant effects or critical hazards.

Enterprise Caffeine
Standard – Cal #3 (2 ug/mL) No known significant effects or critical hazards.

Enterprise Caffeine
Standard – Cal #4 (5 ug/mL) No known significant effects or critical hazards.

Enterprise Caffeine
Standard – Cal #5 (25 ug/
mL) No known significant effects or critical hazards.

Enterprise Caffeine
Standard – Cal #6 (50 ug/
mL) No known significant effects or critical hazards.

Enterprise Caffeine
Standard – Cal #7 (100 ug/
mL) No known significant effects or critical hazards.

Enterprise Caffeine
Standard – Cal #8 (200 ug/
mL) No known significant effects or critical hazards.

Inhalation

: Enterprise Caffeine
Standard – Cal #1 (0.5 ug/
mL) No known significant effects or critical hazards.

Enterprise Caffeine
Standard – Cal #2 (1 ug/mL) No known significant effects or critical hazards.

Enterprise Caffeine
Standard – Cal #3 (2 ug/mL) No known significant effects or critical hazards.

Enterprise Caffeine
Standard – Cal #4 (5 ug/mL) No known significant effects or critical hazards.

Enterprise Caffeine
Standard – Cal #5 (25 ug/
mL) No known significant effects or critical hazards.

Enterprise Caffeine
Standard – Cal #6 (50 ug/
mL) No known significant effects or critical hazards.

Enterprise Caffeine
Standard – Cal #7 (100 ug/
mL) No known significant effects or critical hazards.

Enterprise Caffeine
Standard – Cal #8 (200 ug/
mL) No known significant effects or critical hazards.

Skin contact

: Enterprise Caffeine
Standard – Cal #1 (0.5 ug/
mL) No known significant effects or critical hazards.

Enterprise Caffeine
Standard – Cal #2 (1 ug/mL) No known significant effects or critical hazards.

Enterprise Caffeine
Standard – Cal #3 (2 ug/mL) No known significant effects or critical hazards.

Enterprise Caffeine
Standard – Cal #4 (5 ug/mL) No known significant effects or critical hazards.

Enterprise Caffeine
Standard – Cal #5 (25 ug/
mL) No known significant effects or critical hazards.

Section 11. Toxicological information

	mL)	
	Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #6 (50 ug/	
	mL)	
	Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #7 (100 ug/	
	mL)	
	Enterprise Caffeine	No known significant effects or critical hazards.
	Standard – Cal #8 (200 ug/	
	mL)	
Ingestion	:	Enterprise Caffeine
		Standard – Cal #1 (0.5 ug/
		mL)
		Enterprise Caffeine
		Standard – Cal #2 (1 ug/mL)
		Enterprise Caffeine
		Standard – Cal #3 (2 ug/mL)
		Enterprise Caffeine
		Standard – Cal #4 (5 ug/mL)
		Enterprise Caffeine
		Standard – Cal #5 (25 ug/
		mL)
		Enterprise Caffeine
		Standard – Cal #6 (50 ug/
		mL)
		Enterprise Caffeine
		Standard – Cal #7 (100 ug/
		mL)
		Enterprise Caffeine
		Standard – Cal #8 (200 ug/
		mL)

Symptoms related to the physical, chemical and toxicological characteristics

Eye contact	:	Enterprise Caffeine	No specific data.
		Standard – Cal #1 (0.5 ug/	
		mL)	
		Enterprise Caffeine	No specific data.
		Standard – Cal #2 (1 ug/mL)	
		Enterprise Caffeine	No specific data.
		Standard – Cal #3 (2 ug/mL)	
		Enterprise Caffeine	No specific data.
		Standard – Cal #4 (5 ug/mL)	
		Enterprise Caffeine	No specific data.
		Standard – Cal #5 (25 ug/	
		mL)	
		Enterprise Caffeine	No specific data.
		Standard – Cal #6 (50 ug/	
		mL)	
		Enterprise Caffeine	No specific data.
		Standard – Cal #7 (100 ug/	
		mL)	
		Enterprise Caffeine	No specific data.
		Standard – Cal #8 (200 ug/	
		mL)	
Inhalation	:	Enterprise Caffeine	No specific data.
		Standard – Cal #1 (0.5 ug/	
		mL)	
		Enterprise Caffeine	No specific data.
		Standard – Cal #2 (1 ug/mL)	
		Enterprise Caffeine	No specific data.
		Standard – Cal #3 (2 ug/mL)	
		Enterprise Caffeine	No specific data.

Section 11. Toxicological information

	Standard – Cal #4 (5 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #5 (25 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #6 (50 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #7 (100 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #8 (200 ug/mL)	
Skin contact	: Enterprise Caffeine	No specific data.
	Standard – Cal #1 (0.5 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #2 (1 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #3 (2 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #4 (5 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #5 (25 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #6 (50 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #7 (100 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #8 (200 ug/mL)	
Ingestion	: Enterprise Caffeine	No specific data.
	Standard – Cal #1 (0.5 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #2 (1 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #3 (2 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #4 (5 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #5 (25 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #6 (50 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #7 (100 ug/mL)	
	Enterprise Caffeine	No specific data.
	Standard – Cal #8 (200 ug/mL)	

Delayed and immediate effects as well as chronic effects from short and long-term exposure

Short term exposure

Potential immediate effects : Not available.

Potential delayed effects : Not available.

Section 11. Toxicological information

Long term exposure

Potential immediate effects : Not available.

Potential delayed effects : Not available.

Potential chronic health effects

General	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	No known significant effects or critical hazards.
Carcinogenicity	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	No known significant effects or critical hazards.
Mutagenicity	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	No known significant effects or critical hazards.

Section 11. Toxicological information

	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	No known significant effects or critical hazards.
Reproductive toxicity	: Enterprise Caffeine Standard – Cal #1 (0.5 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #2 (1 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #3 (2 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #4 (5 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #5 (25 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #6 (50 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #7 (100 ug/mL)	No known significant effects or critical hazards.
	Enterprise Caffeine Standard – Cal #8 (200 ug/mL)	No known significant effects or critical hazards.

Numerical measures of toxicity

Acute toxicity estimates

N/A

Section 12. Ecological information

Toxicity

Not available.

Persistence and degradability

Not available.

Bioaccumulative potential

Not available.

Mobility in soil

Soil/water partition coefficient (K_{oc}) : Not available.

Other adverse effects : No known significant effects or critical hazards.

Section 13. Disposal considerations

Disposal methods : The generation of waste should be avoided or minimised wherever possible. Disposal of this product, solutions and any by-products should at all times comply with the requirements of environmental protection and waste disposal legislation and any regional local authority requirements. Dispose of surplus and non-recyclable products via a licensed waste disposal contractor. Waste should not be disposed of untreated to the sewer unless fully compliant with the requirements of all authorities with jurisdiction. Waste packaging should be recycled. Incineration or landfill should only be considered when recycling is not feasible. This material and its container must be disposed of in a safe way. Empty containers or liners may retain some product residues. Avoid dispersal of spilt material and runoff and contact with soil, waterways, drains and sewers.

Section 14. Transport information

ADG / IMDG / IATA : Not regulated as Dangerous Goods according to the ADG Code .

Special precautions for user : **Transport within user's premises:** always transport in closed containers that are upright and secure. Ensure that persons transporting the product know what to do in the event of an accident or spillage.

Transport in bulk according to IMO instruments : Not available.

Section 15. Regulatory information

Standard for the Uniform Scheduling of Medicines and Poisons

Not regulated.

Model Work Health and Safety Regulations - Scheduled Substances

No listed substance

International regulations

Chemical Weapon Convention List Schedules I, II & III Chemicals

Not listed.

Montreal Protocol

Not listed.

Stockholm Convention on Persistent Organic Pollutants

Not listed.

Rotterdam Convention on Prior Informed Consent (PIC)

Not listed.

UNECE Aarhus Protocol on POPs and Heavy Metals

Not listed.

Inventory list

Australia : All components are listed or exempted.

New Zealand : All components are listed or exempted.

United States : All components are active or exempted.

Section 16. Any other relevant information

History

Date of issue/Date of revision : 22/05/2024

Date of previous issue : 31/05/2022

Version : 7

Section 16. Any other relevant information

Key to abbreviations

: ADG = Australian Dangerous Goods
ADR = The European Agreement concerning the International Carriage of Dangerous Goods by Road
ATE = Acute Toxicity Estimate
BCF = Bioconcentration Factor
GHS = Globally Harmonized System of Classification and Labelling of Chemicals
IATA = International Air Transport Association
IBC = Intermediate Bulk Container
IMDG = International Maritime Dangerous Goods
LogPow = logarithm of the octanol/water partition coefficient
MARPOL = International Convention for the Prevention of Pollution From Ships, 1973 as modified by the Protocol of 1978. ("Marpol" = marine pollution)
N/A = Not available
SUSMP = Standard Uniform Schedule of Medicine and Poisons
UN = United Nations

Procedure used to derive the classification

Classification
Not classified.

Indicates information that has changed from previously issued version.

Notice to reader

Disclaimer: The information contained in this document is based on Agilent's state of knowledge at the time of preparation. No warranty as to its accurateness, completeness or suitability for a particular purpose is expressed or implied.