VP HiVeg™ Medium MV662

VP HiVeg Medium is recommended for the isolation of *Vibrio parahaemolyticus* from clinical specimens, foodstuffs and environmental samples.

Composition ** :

Ingredients	Grams/Litre
HiVeg peptone	10.0
Yeast extract	5.0
Synthetic detergent No. V	5.0
Sodium thiosulphate	10.0
Sodium chloride	20.0
Sodium lauryl sulphate	0.2
Sodium citrate	10.0
Sucrose	20.0
Bromo thymol blue	0.04
Thymol blue	0.04
Agar	20.0

Final pH (at 25°C) 8.6 ± 0.2
** Formula adjusted, standardized to suit performance parameters.

Directions :

Suspend 100.28 grams in 1000 ml distilled water. Heat to boiling to dissolve the medium completely. DO NOT AUTOCLAVE. Pour into sterile petri plates.

Principle and Interpretation :

VP HiVeg Medium is prepared using HiVeg peptone in place of Peptic digest of animal tissue making the medium free from BSE/TSE risks. This medium is the modification of VP Medium which is prepared according to formula of De et al (1) and recommended for selective isolation of *Vibrio* species, especially *Vibrio parahaemolyticus* from clinical specimens, foodstuffs, and environmental sample (2). The medium contains HiVeg peptone and yeast extract, which provide nitrogenous compounds, vitamin B complex and other essential growth nutrients. Sucrose is added as a fermentable sugar.
Sodium citrate, sodium lauryl sulphate, synthetic detergent No. V and sodium thiosulphate as well as high alkalinity of the medium inhibit most of the contaminating organisms. Bromolthymol blue and thymol blue are pH indicators. The alkaline pH of the medium and higher concentration of sodium chloride improves the recovery of *Vibrio parahaemolyticus*. Sucrose fermenting organisms like *Vibrio cholerae* and *Vibrio alginolyticus* produce yellow coloured colonies. *Vibrio parahaemolyticus* is a sucrose non-fermenting organism and produce blue-green colonies, as does *Vibrio vulnificus*. Occasionally a few enteric sucrose non-fermenters may exhibit growth e.g. *Proteus* group.

Product Profile :

Vegetable based (Code MV)◉	Animal based (Code M)
MV662 HiVeg peptone Synthetic detergent No. V	**M662** Peptic digest of animal tissue Sodium taurocholate

Recommended for	:	Isolation of *Vibrio parahaemolyticus* from clinical specimens, foodstuffs and environmental samples.
Reconstitution	:	100.28 g/l
Quantity on preparation (500g)	:	4.98 L
pH (25°C)	:	8.6 ± 0.2
Supplement	:	None
Sterilization	:	Boiling (DO NOT AUTOCLAVE)

Storage : Dry Medium-Below 30°C, Prepared Medium 2-8°C.

Quality Control :

Appearance of powder
Yellow with tancast coloured, may have slightly greenish tinge, homogeneous, free flowing powder.
Gelling
Firm, comparable with 2.0% Agar gel
Colour and Clarity
Bluish green coloured, clear to slightly opalascent gel forms in petri plates.
Reaction
Reaction of 10% w/v aqueous solution is pH 8.6 ± 0.2 at 25°C.
Cultural Response
Cultural characteristics observed after an incubation at 35 - 37°C for 18 - 24 hours.

Organisms (ATCC)	Inoculum (CFU)	Growth	Recovery	Colour of Colony
Enterococcus faecalis (29212)	10^2-10^3	poor	<20%	yellow
Escherichia coli (25922)	10^2-10^3	inhibited	0%	-
Shigella flexneri (12022)	10^2-10^3	inhibited	0%	-
Vibrio cholerae (15748)	10^2-10^3	good	>50%	yellow
Vibrio parahaemolyticus (11344)	10^2-10^3	good-luxuriant	>70%	blue-green
Vibrio vulnificus	10^2-10^3	good	>50%	greenish yellow

References :

1. De, S.P. et al (1977), Indian J. Med. Res. 66,398.
2. MacFaddin J., 1985, Media for Isolation - Cultivation - Identification - Maintenance of Medical Bacteria Vol. 1, Williams and Wilkins, Baltimore.

◉ Prepared from GMO free Vegetable proteins replacing Animal based peptones. Freedom from BSE/TSE worries.