

NUTRIENT MIXTURES F-10, F-12, AND DMEM: F-12

Nutrient Mixture	F-10 ⁽¹⁾	F-12 ⁽²⁾	DMEM:F-12 (1:1)
Catalogue No. Component	01-090-1 mg/litre	01-095-1 mg/litre	01-170-1* mg/litre
CaCl ₂ ·2H ₂ O	44.1	44.0	154.76
CuSO ₄ ·5H ₂ O	0.0025	0.0025	0.00125
FeSO ₄ ·7H ₂ O	0.834	0.834	0.417
Fe(NO ₃) ₃ ·9H ₂ O	-	-	0.05
KCl	285.0	223.6	311.8
KH ₂ PO ₄	83.0	-	-
MgCl ₂ ·6H ₂ O	-	122.0	61.0
MgSO ₄ ·7H ₂ O	152.8	-	100.0
NaCl	7400.0	7599.0	6999.5
NaHCO ₃	1200.0	1176.0	1200.0
NaH ₂ PO ₄ ·H ₂ O	-	-	62.5
Na ₂ HPO ₄	153.7	142.04	71.02
ZnSO ₄ ·7H ₂ O	0.0288	0.863	0.4315
D-GLUCOSE	1100.0	1802.0	3151.0
HEPES	-	-	3575.0
HYPOXANTHINE	4.0	4.1	2.05
LINOLEIC ACID	-	0.084	0.042
LIPOIC ACID	0.2	0.2	0.1
PHENOL RED	1.2	1.2	8.1
PUTRESCINE 2HCl	-	0.161	0.0805
SODIUM PYRUVATE	110.0	110.0	55.0
THYMIDINE	0.7	0.73	0.365
L-ALANINE	9.0	8.9	4.45
L-ARGININE HCl	211.0	211.0	147.5
L-ASPARAGINE·H ₂ O	15.0	15.0	7.505
L-ASPARTIC ACID	13.3	13.3	6.65
L-CYSTEINE HCl·H ₂ O	35.12	35.12	17.56
L-CYSTINE	-	-	24.0

NUTRIENT MIXTURES F-10, F-12, AND DMEM: F-12 (cont.)

Nutrient Mixture Catalogue No. Component	F-10(1) 01-090-1 mg/litre	F-12(2) 01-095-1 mg/litre	DMEM:F-12 (1:1) 01-170-1* mg/litre
L-GLUTAMIC ACID	14.7	14.7	7.35
L-GLUTAMINE	146.0	146.0	365.0*
GLYCINE	7.51	7.5	18.75
L-HISTIDINE HCl·H ₂ O	23.0	20.96	31.48
L-ISOLEUCINE	2.6	3.94	54.47
L-LEUCINE	13.0	13.1	59.05
L-LYSINE HCl	29.0	36.5	91.25
L-METHIONINE	4.48	4.48	17.24
L-PHENYLALANINE	5.0	4.96	35.48
L-PROLINE	11.5	34.5	17.25
L-SERINE	10.5	10.5	26.25
L-THREONINE	3.57	11.9	53.45
L-TRYPTOPHAN	0.6	2.04	9.02
L-TYROSINE	1.8	5.4	38.7
L-VALINE	3.5	11.7	52.85
D-BIOTIN	0.024	0.0073	0.00365
D-CALCIUM PANTOTHENATE	0.715	0.48	2.24
CHOLINE CHLORIDE	0.698	13.96	8.98
FOLIC ACID	1.32	1.3	2.65
i-INOSITOL	0.541	18.0	12.6
NIACINAMIDE	0.615	0.037	2.02
PYRIDOXAL HCl	-	-	2.0
PYRIDOXINE HCl	0.206	0.062	0.031
RIBOFLAVIN	0.376	0.038	0.219
THIAMINE HCl	1.00	0.34	2.17
VITAMIN B12	1.36	1.36	0.68

* This preparation is without L-Glutamine.

REFERENCES:

1. Ham, R.G., **Exp. Cell Res.**, 29: 515-526, (1963).
2. Ham, R.G., **Proc. Nat. Ac. Sci.**, 53: 288-293, (1965).

