

ABBREVIATIONS

%	-Percentage
α	- alpha
~	-approximately
>	- greater than
Δ O.D.	-change in optical density
μ g	-micro grams
2, 4 D	-2,4 Dichlorophenoxyacetic acid
3 PGA	-Phosphoglyceric acid
ACP	-Acyl Carrier protein
Al	- Aluminium
APX	- Ascorbate peroxidase
As	- Arsenic
ATP	-Adenosine triphosphate
B9-	-Daminozide
BA	-6-Benzyl adenine
BAP-	-6-Benzyl amino purine
BHT	-Butylated Hydroxytoluene
BOD	-Biological Oxygen Demand
BR	-brassinosteroid
BSC	-Bundle Sheath Cells
BSA	-Bovine Serum Albumin
C	-Carbon
C.S.	-Cross section
Ca	-Calcium
CaCl ₂	-Calcium chloride
CCC	-Chlorocholine chloride
Cd	-Cadmium
CIMAP	-Central Institute of Medicinal and Aromatic Plants
CK	-Cytokinin
cm	-centimeter
CO ₂	-Carbon dioxide
COD	-Chemical Oxygen Demand
Cr	-Chromium
Cs	-Cesium
CuSO ₄ , 5H ₂ O	-Copper sulphate
cv	-Cultivar
d	-Day
DAP	-Days after planting
DOXP	-1-deoxy-D xylose-5 phosphate pathway
DPPH	-1-1 diphenyl , 1-2 picryl hydrazil
DW	-Distilled water
e ⁻	electron
E.C.	-Enzyme Code

EC	-Electrical conductivity
EDTA	-Ethylenediamine tetraacetic acid
ES-MS	-Electro Spray Mass Spectroscopy
<i>et al</i>	-Co-workers
Ex	-example
FAD	-Flavin Adenine Dinucleotide
FC	-fusiococcin
Fe	-iron
Fig.	-Figure
FRAP	-Ferric Reducing Antioxidant Power
FTIR	-Fourier Transform-infra Red Spectrum Analysis
FYM	-farm yard manure
g	-Gram
g ⁻¹	-per gram
GA	- Gibberellin
GA ₃	- Gibberellic acid-3
GC	- Gas chromatography
GC X GC	- Two dimensional gas chromatography
GCMS	-Gas chromatography mass spectrometry
GLC	-Gas liquid chromatography
h	- hour
H ₂ O ₂	-hydrogen peroxide
H ₂ SO ₄	- Sulphuric acid
ha	-hectare
HCl	-Hydrochloric acid
Hg	-Mercury
HNO ₃	- Nitric acid
HPLC	- High pressure liquid chromatography
hrs	-hours
i.e.	- that is
IAA	-Indol acetic acid
IBA	- Indole-3-butyric acid
IRGA	- Infra red gas analyzer
J	-Joule
K	-Potassium
KCl	-Potassium chloride
kDa	-kiloDalton
kg	-Kilogram
KNO ₂	.Potassium nitrite
KNO ₃	-Potassium nitrate
KPa	-Kilo Pascal
l	-Litre
m	-Meter
mM/ m mol	- Mili molar
M/ mol	-Molar
MDA	-Malondialdehyde

mg	-milligram
min	- minute
ml	-mililiter
mm	-milimeter
Mn	- Mangnese
Mo-MPT	- Molybdenum Molybdoprotein
MPa	-mega Pascal
mRNA	-messenger Ribonucleic acid
MS	-Murashige and Skoog's medium
N	-nitrogen
Na	-Sodium
Na ₂ CO ₃	-Sodium carbonate
Na ₂ SO ₄	-sodium sulphate
NaCl	-Sodium chloride
NAD	-Nicotinamide adenine dinucleotide
NAD	-Nicotinamide adenine dinucleotide
NAD(P)H	- Nicotinamide adenine dinucleotide phosphate, (Reduced)
NADH	-Nicotinamide adenine dinucleotide reduced
NADP	-Nicotinamide adenine dinucleotide phosphate
NaOH	-Sodium hydroixde
NEEDA	-N(1-Naphyl) ethylene diamide hydrochloride
NH ₃ -N	-Ammonia nitrogen
NH ₄ NO ₃	-Ammonium nitrate
Ni	-Nickel
nm	-nanometer
NMR	-Nuclear Magnetic Resonance
NO	- Nitric oxide
No.	-Number
NR	-Nitrate Reductase
O.D.	-Optical density
O ₂	-Oxygen
°C	-degree Celsius
°F	- degree Fahrenheit
P	-Phosphorus
Pb	-Lead
Pb (NO ₃) ₂	-Lead nitrate
PBZ	- Paclobutrazol
PCV.	-Packed Cell Volume
PEG	-Polyethylene glycol
PGA	-Phospho glyceric acid
PGR	-Plant Growth Regulators
pH	-Hydrogen ion concentration
PI	-Isoelectric point
Pi	-Inorganic phosphorus
ppm	-parts per million

PS I	-Photosystem I
RAPD	- Random Amplification Polymorphic DNA
RH	- Relative humidity
ROS	- Reactive Oxygen Species
RP	-Reducing power
rpm	-Revolution per minute
RT	-Room Temperature
RUBISCO	-Ribulose-1,5-biphosphate carboxylase/oxygenase
S	-Sulphur
SA	-Salicylic acid
SDE	-Steam Distillation and solvent extraction
Se	-Selenium
sec	-Second
SEM	-Scanning Electron Microscopy
SEM-EDS	-Scanning Electron Microscopy/Energy Dispersive X ray Spectroscopy
SOD	-Superoxide Dismutase
sp., spp	-species
SPME	-Solid Phase Microextraction
sq	-square
Sr	-Strontium
t	-tons
TAC	- Total Antioxidant Capacity
TCA	-Trichloro Acetic Acid
TEM	-Transmission Electron Microscopy
TFA	-Trifluoroacetic acid
TLC	-Thin Layer Chromatography
TNT	-Trinitro Toulene
TPP	-Tri Phenyl Phosphite
TRIA	-Triacontanol
UDP	- Uridine diphosphate
UV	-Ultraviolet
v/v	-volume by volume
VS	-Vetiver System
w/w	-weight by weight
wt	-weight
Zn	-zinc
B	-beta
γ	-gamma
Δ	-delta
δ	-delta
μ	-micron
μg	-microgram
μM	-micromolar