

List of Figures- Part-I

Srl no	Figure Heading	Page no
<u>1</u>	Fig1. Graphical presentation of coefficient of determination (R^2) at 1:5 leaf extract of <i>Desmostachya</i> , <i>Parthenium</i> and <i>Alternanthera</i> on <i>Vigna radiata</i> seeds using MS Excel	69
<u>2</u>	Fig2. Graphical presentation of coefficient of determination (R^2) at 1:10 leaf extract of <i>Desmostachya</i> , <i>Parthenium</i> and <i>Alternanthera</i> on <i>Vigna radiata</i> seeds using MS Excel	70
<u>3</u>	Fig3. Graphical presentation of coefficient of determination (R^2) at 1:20 leaf extract of <i>Desmostachya</i> , <i>Parthenium</i> and <i>Alternanthera</i> on <i>Vigna radiata</i> seeds using MS Excel	70
<u>4</u>	Fig4. Graphical presentation of coefficient of determination (R^2) at 1:10 leaf extract of <i>Desmostachya</i> , <i>Parthenium</i> and <i>Alternanthera</i> on <i>Senna occidentalis</i> seeds using MS Excel	101
<u>5</u>	Fig5. Graphical presentation of coefficient of determination (R^2) at 1:10 leaf extract of <i>Desmostachya</i> , <i>Parthenium</i> and <i>Alternanthera</i> on <i>Senna occidentalis</i> seeds using MS Excel	102
<u>6</u>	Fig6. Graphical presentation of coefficient of determination (R^2) at 1:20 leaf extract of <i>Desmostachya</i> , <i>Parthenium</i> and <i>Alternanthera</i> on <i>Senna occidentalis</i> seeds using MS Excel	102
<u>7</u>	Fig7. Graphical presentation of coefficient of determination (R^2) at 1:5 leaf leachate of <i>Desmostachya</i> , <i>Parthenium</i> and <i>Alternanthera</i> on <i>Senna occidentalis</i> seeds using MS Excel	118
<u>8</u>	Fig8. Graphical presentation of coefficient of determination (R^2) at 1:10 leaf leachate of <i>Desmostachya</i> , <i>Parthenium</i> and <i>Alternanthera</i> on <i>Senna occidentalis</i> seeds using MS Excel	119
<u>9</u>	Fig9. Graphical presentation of coefficient of determination (R^2) at 1:20 leaf leachate of <i>Desmostachya</i> , <i>Parthenium</i> and <i>Alternanthera</i> on <i>Senna occidentalis</i> seeds using MS Excel	119
<u>10</u>	Fig10. Comparative Histogram of effect of seed pretreatment with leaf extracts and leaf leachates of <i>Desmostachya bipinnata</i> , <i>Parthenium hysterophorus</i> , <i>Alternanthera sessilis</i> on chromosomal aberrations of <i>Allium cepa</i> root tips.	189
<u>11</u>	Fig11. Comparative Histogram of effect of seed pretreatment with leaf extracts and leaf leachates of <i>Desmostachya bipinnata</i> , <i>Parthenium hysterophorus</i> , <i>Alternanthera sessilis</i> on chromosomal aberrations of <i>Vigna radiata</i> root tips.	189

List of Figures-Part-II

<u>Srl no</u>	<u>PHOTOPLATE-Heading</u>	<u>Page no</u>
<u>0</u>	PHOTOPLATE -1 A, <i>Desmostachya bipinnata</i> , 1B - <i>Parthenium hysterophorus</i> and 1C- <i>Alternanthera sessilis</i>	39
<u>1</u>	PHOTOPLATE of Herbarium sheets -2 A, <i>Desmostachya bipinnata</i> , 2B - <i>Parthenium hysterophorus</i> and 2C- <i>Alternanthera sessilis</i>	40,4 1,42
<u>2</u>	PHOTOPLATE-collage-3, BIOASSAY MATERIALS	44
<u>3</u>	PHOTOPLATE-CON- <i>Vigna radiata</i> seeds untreated/CONTROL	56
<u>4</u>	PHOTOPLATE - 4(a) :- <i>Desmostachya</i> LE 1:5 on <i>Vigna radiata</i> seeds	57
<u>5</u>	PHOTOPLATE - 4(b) :- <i>Desmostachya</i> LL1:5 on <i>Vigna radiata</i> seeds	57
<u>6</u>	PHOTOPLATE - 5(a) :- <i>Parthenium</i> LE 1:5 on <i>Vigna radiata</i> seeds	57
<u>7</u>	PHOTOPLATE - 5(b) :- <i>Parthenium</i> LL1:5 on <i>Vigna radiata</i> seeds	57
<u>8</u>	PHOTOPLATE - 6(a) :- <i>Alternanthera</i> LE 1:5 on <i>Vigna radiata</i> seeds	57
<u>9</u>	PHOTOPLATE - 6(b) :- <i>Alternanthera</i> LL 1:5 on <i>Vigna radiata</i> seeds	57
<u>10</u>	PHOTOPLATE - 7(a) :- :- <i>Desmostachya</i> LE 1:10 on <i>Vigna radiata</i> seeds	58
<u>11</u>	PHOTOPLATE - 7(b) :- <i>Desmostachya</i> LL1:10 on <i>Vigna radiata</i> seeds	58
<u>12</u>	PHOTOPLATE - 8(a) :- <i>Parthenium</i> LE 1:510 on <i>Vigna radiata</i> seeds	58
<u>13</u>	PHOTOPLATE - 8(b) :- <i>Parthenium</i> LL1:10 on <i>Vigna radiata</i> seeds	58
<u>14</u>	PHOTOPLATE - 9(a) :- <i>Alternanthera</i> LE 1:10 on <i>Vigna radiata</i> seeds	58
<u>15</u>	PHOTOPLATE - 9(b) :- <i>Alternanthera</i> LL 1:10 on <i>Vigna radiata</i> seeds	58
<u>16</u>	PHOTOPLATE - 10(a) :- :- <i>Desmostachya</i> LE 1:20 on <i>Vigna radiata</i> seeds	59
<u>17</u>	PHOTOPLATE - 10(b) :- <i>Desmostachya</i> LL1:20 on <i>Vigna radiata</i> seeds	59
<u>18</u>	PHOTOPLATE - 11(a) :- <i>Parthenium</i> LE 1:20 on <i>Vigna radiata</i> seeds	59
<u>19</u>	PHOTOPLATE - 11(b) :- <i>Parthenium</i> LL1:20 on <i>Vigna radiata</i> seeds	59
<u>20</u>	PHOTOPLATE - 12(a) :- <i>Alternanthera</i> LE 1:20 on <i>Vigna radiata</i> seeds	59
<u>21</u>	PHOTOPLATE - 12(b) :- <i>Alternanthera</i> LL 1:20 on <i>Vigna radiata</i> seeds	59
<u>22</u>	PHOTOPLATE - 13:- DLE vs DLL (1:5) vs (1:10) vs (1:20)	60
<u>22</u>	PHOTOPLATE - 14 :-PLE vs PLL (1:5) vs (1:10) vs (1:20)	60
<u>23</u>	PHOTOPLATE - 15:- ALE vs ALL (1:5) vs (1:10) vs (1:20)	60
<u>24</u>	PHOTOPLATE - 16:-Quantitative biochemical analysis of:- Soluble Carbohydrate	61
<u>25</u>	PHOTOPLATE - 17:- Quantitative biochemical analysis of:- Insoluble Carbohydrate	61
<u>26</u>	PHOTOPLATE - 18:- Quantitative biochemical analysis of:- Amino Acid	62
<u>27</u>	PHOTOPLATE - 19:- Quantitative biochemical analysis of:- Protein	62
<u>28</u>	PHOTOPLATE - 20:- Quantitative biochemical analysis of:- DNA	63
<u>26</u>	PHOTOPLATE - 21:- Quantitative biochemical analysis of:- RNA	63
<u>27</u>	PHOTOPLATE - 22:- Quantitative biochemical analysis of:- Dehydrogenase	64
<u>28</u>	PHOTOPLATE - 23:- Quantitative biochemical analysis of:- Catalase	64

<u>Srl no</u>	PHOTOPLATE-Heading	<u>Page no</u>
<u>29</u>	PHOTOPLATE – 24:- Quantitative biochemical analysis of:- Amylase	64
<u>30</u>	<i>PHOTOPLATE – A:- Desmostachya bipinnata in nature</i>	179
<u>31</u>	<i>PHOTOPLATE – B:- Parthenium hysterophorus in nature</i>	179
<u>32</u>	<i>PHOTOPLATE – C- Alternanthera sessilis in nature</i>	179
<u>33</u>	PHOTOPLATE – D:- <i>Allium cepa</i> root tips	179
<u>34</u>	PHOTOPLATE – E:- <i>Vigna radiata</i> root tips	179
<u>35</u>	PHOTOPLATE – 25:- PHOTOPLATE-25 (X 100) (Chromosome Stickiness)	185
<u>36</u>	PHOTOPLATE – 26:- (Depurination) (X 100)	185
<u>37</u>	PHOTOPLATE – 27:- (Micronucleus). (X 100)	185
<u>38</u>	PHOTOPLATE – 28:- (Binucleate cells) (X 100)	185
<u>39</u>	PHOTOPLATE – 29:- <u>CONTROL-1</u> (X 40) Normal Mitosis with Metaphase)	185
<u>40</u>	PHOTOPLATE – 30:- <u>CONTROL-2</u> (X 40) (Normal Mitosis with Anaphase)	185
<u>41</u>	PHOTOPLATE – 31:- (Chromosomal Clumping). (X 100)	186
<u>42</u>	PHOTOPLATE – 32:- (Anaphase Bridge). (X 100)	186
<u>43</u>	PHOTOPLATE – 33:- (X 40) (Normal Mitosis with Prophase)	186
<u>44</u>	PHOTOPLATE – 34:- (Chromosome fragmentation). (X 100)	186
<u>45</u>	PHOTOPLATE – 35:- PHOTOPLATE-35 (Chromosome Stickiness)	187
<u>46</u>	PHOTOPLATE – 36:- PHOTOPLATE-36 (Multinucleation)	187
<u>47</u>	PHOTOPLATE – 37:- PHOTOPLATE- 37 (Late separation with micronucleus).	187
<u>48</u>	PHOTOPLATE – 38:- PHOTOPLATE-38 (Binucleate cells)	187
<u>49</u>	PHOTOPLATE – 39:- <u>CONTROL-A</u> (Normal Mitosis with Metaphase)	187
<u>50</u>	PHOTOPLATE – 40:- <u>CONTROL-B</u> (Normal Mitosis with Anaphase)	187
<u>51</u>	PHOTOPLATE – 41:- (Clumping)	188
<u>51</u>	PHOTOPLATE – 42:- (Anaphase Bridge)	188
<u>51</u>	PHOTOPLATE – 43:- (Late separation with micronucleus)	188
<u>52</u>	PHOTOPLATE – 44:- (Chromosome fragmentation)	188