

**Table 1-S.** Total and differential proteoma in germinative axillary buds of sugarcane RB67515 in the second ratoon.

N°/Accession or protein ID/Database	Description	N° of match/unique	Mascot Score	Protein Sequence Coverage (%)	Monoisotopic Mass (Mr) (Da)	Species
1/CLH1_ORYSJ/ SwissProt	Clathrin heavy chain 1	3/3	168	2	194534	<i>Oryza sativa</i> Japonica Group
2/EMS49802.1/ NCBIprot	<sup>a</sup> Nuclease domain-containing protein 1 (TUDOR-SN)	1/1	71	1	114200	<i>Triticum urartu</i>
3/OEL36369.1/ NCBIprot	<sup>a</sup> Glycine dehydrogenase (decarboxylating), mitochondrial	1/1	53	1	109050	<i>Dichantheium oligosanthes</i>
4/AEK76075.1/ NCBIprot	<sup>a</sup> Heat shock protein 101 (Hsp101)	1/1	51	1	101101	<i>Saccharum</i> hybrid cultivar SP80-3280
5/ONM35737.1/ NCBIprot	Lipoxygenase	2/2	113	2	99495	<i>Zea mays</i>
6/AQK50302.1/ NCBIprot	<sup>a</sup> Aconitase 1	3/3	155	5	98858	<i>Zea mays</i>
7/OEL20031.1/ NCBIprot	Elongation factor 2	7/2	371	11	94808	<i>Dichantheium oligosanthes</i>
8/AGI56230.1/ NCBIprot	Sucrose synthase	5/5	367	9	93492	<i>Saccharum officinarum</i>
9/PLDA1_MAIZE/ SwissProt	Phospholipase D alpha 1	1/1	54	2	92640	<i>Zea mays</i>
10/KXG24059.1/ NCBIprot	Hypothetical protein (5-methyltetrahydropteroyltriglutamate--homocysteine methyltransferase	10/5	650	20	84696	<i>Sorghum bicolor</i>
11/HSP81_ORYSJ/ SwissProt	Heat Shock Protein 90 (HSP90)	1/1	59	1	80429	<i>Oryza sativa</i> Indica Group
12/EMT19614.1/ NCBIprot	Eukaryotic translation initiation factor 3 subunit B	1/1	61	1	77628	<i>Aegilops tauschii</i>
13/AGF69114.1/ NCBIprot	Phenylalanine ammonia lyase	6/1	358	12	76007	<i>Saccharum</i> hybrid cultivar ROC22
14/ONM42155.1/ NCBIprot	<sup>a</sup> Alpha-L-arabinofuranosidase	1/1	72	2	75516	<i>Zea mays</i>

**Table 1-S.** Cont.

N°/Accession or protein ID/Database	Description	N° of match/unique	Mascot Score	Protein Sequence Coverage (%)	Monoisotopic Mass (Mr) (Da)	Species
<b>15</b> /ACOX1_ARATH/ SwissProt	<sup>a</sup> Peroxisomal acyl-coenzyme A oxidase	1/1	70	1	74996	<i>Arabidopsis thaliana</i>
<b>16</b> /AQK80917.1/ NCBIprot	<sup>a</sup> Endoplasmic-like protein	1/1	64	2	74775	<i>Zea mays</i>
<b>17</b> /TKTC_MAIZE/ SwissProt	Transketolase, chloroplastic	1/1	66	1	73347	<i>Zea mays</i>
<b>18</b> /AGT15890.1/ NCBIprot	Luminal-binding protein (Heat shock 70 kDa protein BIP1)	1/1	71	2	73312	<i>Saccharum</i> hybrid cultivar R570
<b>19</b> /AQK91457.1/ NCBIprot	<sup>a</sup> Enoyl-CoA hydratase	1/1	67	4	71334	<i>Zea mays</i>
<b>20</b> /HSP7E_ARATH/ SwissProt	Heat shock 70 kDa (HSP70)	4/0	254	6	71270	<i>Arabidopsis thaliana</i>
<b>21</b> /SDHA_ORYSJ/ SwissProt	<sup>a</sup> Succinate dehydrogenase [ubiquinone] flavoprotein subunit, mitochondrial	2/2	140	4	69494	<i>Oryza sativa</i> Japonica Group
<b>22</b> /XP_020192603.1/ NCBIprot	Glucose-6-phosphate isomerase 1, chloroplastic	1/1	51	1	67825	<i>Aegilops tauschii</i> subsp. <i>tauschii</i>
<b>23</b> /AAB94293.1/ NCBIprot	Polyphenol oxidase	5/1	314	12	67709	<i>Saccharum</i> hybrid cultivar
<b>24</b> /A2XFI3.2/ NCBIprot	Pyruvate decarboxylase	1/1	52	2	65889	<i>Oryza sativa</i> Indica Group
<b>25</b> /AAC49177.1 / NCBIprot	<sup>a</sup> Dhurrinase	1/1	50	1	64195	<i>Sorghum bicolor</i>
<b>26</b> /ONL98792.1/ NCBIprot	Nucleoredoxin 1	1/1	60	2	64030	<i>Zea mays</i>
<b>27</b> /AQK54720.1/ NCBIprot	<sup>a</sup> Pyrophosphate--fructose 6-phosphate 1-phosphotransferase subunit alpha 2	1/1	62	2	63745	<i>Zea mays</i>
<b>28</b> /AGT16432.1/ NCBIprot	Phosphoglucomutase	3/2	170	12	63202	<i>Saccharum</i> hybrid cultivar R570

**Tabela 1-S.** Cont.

N°/Accession or protein ID/Database	Description	N° of match/unique	Mascot Score	Protein Sequence Coverage (%)	Monoisotopic Mass (Mr) (Da)	Species
<b>29</b> /VATA_MAIZE/ SwissProt	V-type proton ATPase catalytic subunit A	2/1	106	6	62198	<i>Zea mays</i>
<b>30</b> /XP_002438147.1/ NCBIprot	<sup>a</sup> Hypothetical protein (Pyrophosphate--fructose 6-phosphate 1-phosphotransferase subunit beta – UniProtKB)	2/2	125	6	61755	<i>Sorghum bicolor</i>
<b>31</b> /ONM26494.1/ NCBIprot	<sup>a</sup> Protein disulfide-isomerase	1/1	62	3	61141	<i>Zea mays</i>
<b>32</b> /KXG33615.1/ NCBIprot	<sup>a</sup> Hypothetical protein (2,3-bisphosphoglycerate-independent phosphoglycerate mutase - UniProtKB)	1/1	101	3	60384	<i>Sorghum bicolor</i>
<b>33</b> /TCPH_ARATH/ SwissProt	<sup>a</sup> T-complex protein 1 subunit beta	1/1	63	3	60195	<i>Arabidopsis thaliana</i>
<b>34</b> /ATPBM_MAIZE/ SwissProt	ATP synthase subunit beta, mitochondrial	5/4	342	12	59181	<i>Zea mays</i>
<b>35</b> /KQL27706.1/ NCBIprot	<sup>a</sup> Hypothetical protein (RuBisCO large subunit-binding protein subunit beta, chloroplastic – UniProtKB)	1/1	53	2	58608	<i>Setaria italica</i>
<b>36</b> /NP_001167830.1/ NCBIprot	Putative TCP-1/cpn60 chaperonin family protein (HSP60)	2/2	128	11	58096	<i>Zea mays</i>
<b>37</b> /XP_006647227.1/ NCBIprot	<sup>a</sup> Predicted: T-complex protein 1 subunit delta	1/1	61	4	58060	<i>Oryza brachyantha</i>
<b>38</b> /3FR7_A/ NCBIprot	Chain A, Ketol-Acid Reductoisomerase (Kari) In Complex With Mg2+	1/1	91	3	57566	<i>Oryza sativa</i> Japonica group
<b>39</b> /AHZ13843.1/ NCBIprot	Catalase	2/2	129	5	56820	<i>Saccharum</i> hybrid cultivar Yacheng05-179
<b>40</b> /ADP02192.1/ NCBIprot	Putative non-cyanogenic beta-glucosidase	1/1	69	3	56692	<i>Triticum aestivum</i>

**Table 1-S** – Cont.

N°/Accession or protein ID/Database	Description	N° of match/unique	Mascot Score	Protein Sequence Coverage (%)	Monoisotopic Mass (Mr) (Da)	Species
<b>41</b> /UAP1_ARATH/ SwissProt	UDP-N-acetylglucosamine diphosphorylase	1/1	67	2	56584	<i>Arabidopsis thaliana</i>
<b>42</b> /OEL32960.1/ NCBIprot	Leucine aminopeptidase 2, chloroplastic	2/2	120	5	55748	<i>Dichantheium oligosanthes</i>
<b>43</b> /AQK64652.1/ NCBIprot	Putative serine protease EDA2; Serine carboxypeptidase family	1/1	56	2	55538	<i>Zea mays</i>
<b>44</b> /AMYB_MAIZE/ SwissProt	Beta-amylase	1/1	54	3	55487	<i>Zea mays</i>
<b>45</b> /BADH2_ORYSI/ SwissProt	Betaine aldehyde dehydrogenase	1/1	52	2	55446	<i>Oryza sativa</i> Indica Group
<b>46</b> /AMS36872.1/ NCBIprot	Aldehyde dehydrogenase family 7	1/1	51	2	54885	<i>Saccharum spontaneum</i>
<b>47</b> /VATB1_ARATH/ SwissProt	V-type proton ATPase subunit B1	6/3	345	17	54188	<i>Arabidopsis thaliana</i>
<b>48</b> /UGDH4_ORYSJ/ SwissProt	UDP-glucose 6-dehydrogenase	4/4	261	12	53391	<i>Oryza sativa</i> Japonica group
<b>49</b> /ADJ96635.1/ NCBIprot	S-adenosyl homocysteine hydrolase	2/2	123	8	53353	<i>Dunaliella salina</i>
<b>50</b> /XP_002444986.1/ NCBIprot	Hypothetical protein (Glycosyltransferase – UniProtKB)	1/1	51	3	53225	<i>Sorghum bicolor</i>
<b>51</b> /XP_002442053.1/ NCBIprot	<sup>a</sup> Hypothetical protein (Argininosuccinate synthase – UniProtKB)	1/1	64	3	53100	<i>Sorghum bicolor</i>
<b>52</b> /6PGD1_ORYSJ/ SwissProt	6-phosphogluconate dehydrogenase, decarboxylating 1	2/2	120	6	52973	<i>Oryza sativa</i> Japonica Group
<b>53</b> /ACL80329.1/ NCBIprot	UDP-glucose pyrophosphorylase	7/6	388	14	52431	<i>Saccharum officinarum</i>
<b>54</b> /AQK49354.1/ NCBIprot	Apyrase	1/1	64	2	52164	<i>Zea mays</i>
<b>55</b> /AAR06264.1/ NCBIprot	<sup>a</sup> GDP dissociation inhibitor protein	1/1	58	5	49644	<i>Hordeum vulgare</i>

**Table 1-S.** cont.

N°/Accession or protein ID/Database	Description	N° of match/unique	Mascot Score	Protein Sequence Coverage (%)	Monoisotopic Mass (Mr) (Da)	Species
56/ENO_ORYSJ/ SwissProt	Enolase	5/0	291	18	48285	<i>Oryza sativa</i> Japonica group
57/XP_010065824.1/ NCBIprot	<sup>a</sup> Predicted: LL-diaminopimelate aminotransferase chloroplastic	1/1	58	2	47622	<i>Eucalyptus grandis</i>
58/ACG36145.1/ NCBIprot	<sup>a</sup> Elongation factor 1-gamma	1/1	58	4	47357	<i>Zea mays</i>
59/AOR16603.1/ NCBIprot	<sup>a</sup> MDHAR (Monodehydroascorbate reductase)	2/2	100	8	46873	<i>Saccharum arundinaceum</i>
60/NP_001150503.1/ NCBIprot	<sup>a</sup> 3-N-debenzoyl-2-deoxytaxol N-benzoyltransferase	2/2	120	4	46584	<i>Zea mays</i>
61/OEL33883.1/ NCBIprot	<sup>a</sup> Isocitrate dehydrogenase [NADP], chloroplastic	1/1	60	4	46521	<i>Dichantherium oligosanthes</i>
62/AAQ06283/ NCBIprot	<sup>a</sup> Putative selenium binding protein	1/1	49	2	46044	<i>Zea mays</i>
63/XP_006664612.1/ NCBIprot	<sup>a</sup> Predicted: tryptophan--tRNA ligase, cytoplasmic	1/1	60	2	45043	<i>Oryza brachyantha</i>
64/EMT17354.1/ NCBIprot	Transaldolase	1/1	64	3	44868	<i>Aegilops tauschii</i>
65/AGT16628.1/ NCBIprot	Elongation factor 1-alpha	1/1	48	2	44302	<i>Saccharum</i> hybrid cultivar R570
66/ONM08780.1/ NCBIprot	Alpha tubulin; Tua	1/1	62	3	44179	<i>Zea mays</i>
67/TBB1_AVESA/ SwissProt	Tubulin beta chain	1/1	61	2	43839	<i>Avena sativa</i>
68/BOLDU6.1/ NCBIprot	<sup>a</sup> Polyketide synthase (Chalcone synthase)	1/1	55	3	43203	<i>Rubus idaeus</i>
69/ONM15574.1/ NCBIprot	Isopropylmalate dehydrogenase	1/1	52	3	43132	<i>Zea mays</i>

**Table 1-S** – Cont.

N°/Accession or protein ID/Database	Description	N° of match/unique	Mascot Score	Protein Sequence Coverage (%)	Monoisotopic Mass (Mr) (Da)	Species
<b>70</b> /NP_001295433.1/NCBIprot	<sup>a</sup> Pyruvate dehydrogenase	1/1	65	3	43066	<i>Zea mays</i>
<b>71</b> /OEL23402.1/NCBIprot	Phosphoglycerate kinase, cytosolic	4/1	216	15	42504	<i>Dichantherium oligosanthes</i>
<b>72</b> /JAT47082.1/NCBIprot	Putative acetyl-CoA acetyltransferase, cytosolic 2 (Thiolase-2)	2/2	86	9	42133	<i>Anthurium amnicola</i>
<b>73</b> /XP_002464260.1/NCBIprot	Hypothetical protein (Alpha-1,4-glucan-protein synthase - UniProtKB)	2/2	143	10	41964	<i>Sorghum bicolor</i>
<b>74</b> /OEL24402.1/NCBIprot	3-hydroxyisobutyryl-CoA hydrolase-like protein 5, partial	2/2	115	6	41366	<i>Dichantherium oligosanthes</i>
<b>75</b> /ONM04297.1/NCBIprot	<sup>a</sup> 12-oxo-phytodienoic acid reductase7	1/1	52	2	41291	<i>Zea mays</i>
<b>76</b> /OEL38468.1/NCBIprot	<sup>a</sup> Aspartate aminotransferase, chloroplastic	1/1	56	4	41132	<i>Dichantherium oligosanthes</i>
<b>77</b> /ONM22945.1/NCBIprot	<sup>a</sup> P-loop containing nucleoside triphosphate hydrolase superfamily protein	1/1	66	4	39908	<i>Zea mays</i>
<b>78</b> /AAQ67347.1/NCBIprot	Caffeic acid 3-O-methyltransferase	1/1	76	5	39824	<i>Saccharum</i> hybrid cultivar
<b>79</b> /XP_002465329.1/NCBIprot	<sup>a</sup> Hypothetical protein (Ricin B-like lecithin R40G2 – UniProtKB)	1/1	79	5	39718	<i>Sorghum bicolor</i>
<b>80</b> /AAW21273.1/NCBIprot	<sup>a</sup> Glutamine synthetase	1/1	50	7	39387	<i>Saccharum officinarum</i>
<b>81</b> /BAI59775.1/NCBIprot	Fructose-bisphosphate aldolase	2/2	147	10	39170	<i>Phyllostachys edulis</i>
<b>82</b> /OEL30497.1/NCBIprot	2-alkenal reductase (NADP(+)-dependent)	1/1	84	6	38800	<i>Dichantherium oligosanthes</i>
<b>83</b> /XP_002440480.1/	Hypothetical protein (Legumin-like protein	1/1	84	3	38091	<i>Sorghum bicolor</i>

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NCBIprot                      – UniProtKB)

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**Table 1-S. Cont.**

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N°/Accession or protein ID/Database	Description	N° of match/unique	Mascot Score	Protein Sequence Coverage (%)	Monoisotopic Mass (Mr) (Da)	Species
<b>84</b> /EMS53569.1/ NCBIprot	Adenosine kinase	2/2	115	11	37680	<i>Triticum urartu</i>
<b>85</b> /OEL25000.1/ NCBIprot	Ribokinase	1/1	52	3	37603	<i>Dichantheium oligosanthes</i>
<b>86</b> /GBLPA_ORYSJ/ SwissProt	Guanine nucleotide-binding protein subunit beta-like protein	2/2	184	8	36665	<i>Oryza sativa</i> Japonica Group
<b>87</b> /AEP31954.1/ NCBIprot	Glyceraldehyde-3-phosphate dehydrogenase	3/2	199	12	36586	<i>Aeluropus lagopoides</i>
<b>88</b> /XP_004982864.1/ NCBIprot	Predicted: malate dehydrogenase (D-3-Phosphoglycerate dehydrogenase)	4/3	250	20	35803	<i>Setaria italica</i>
<b>89</b> /NP_001130539.1/ NCBIprot	<sup>a</sup> Late embryogenesis abundant protein group 2 (Hydrophilins)	1/1	65	3	35309	<i>Zea mays</i>
<b>90</b> /APF31922.1/ NCBIprot	Putative fructokinase 1	3/3	164	11	34865	<i>Saccharum spontaneum</i>
<b>91</b> /RLAO_MAIZE/ SwissProt	<sup>a</sup> 60S acidic ribosomal protein P0	2/2	131	14	34597	<i>Zea mays</i>
<b>92</b> /CYSK_MAIZE/ SwissProt	Cysteine synthase	1/1	59	3	34299	<i>Zea mays</i>
<b>93</b> /PER70_MAIZE/ SwissProt	Peroxidase 70	1/1	70	6	33973	<i>Zea mays</i>
<b>94</b> /AHF18211.1/ NCBIprot	Glyoxylase 1	1/1	77	3	33005	<i>Saccharum</i> hybrid cultivar
<b>95</b> /KXG21491.1/ NCBIprot	<sup>a</sup> Hypothetical protein (Stem 28 kDa glycoprotein – UniProtKB)	1/1	69	4	32782	<i>Sorghum bicolor</i>
<b>96</b> /AQK79360.1/ NCBIprot	Aspartic proteinase A1	3/3	194	16	32615	<i>Zea mays</i>
<b>97</b> /ACN33806.1/ NCBIprot	<sup>a</sup> Unknown (6-phosphogluconolactonase – UniProtKB)	1/1	73	6	28956	<i>Zea mays</i>



<b>98/OEL31707.1/</b> NCBIprot	<sup>a</sup> 60S ribosomal protein L8-1 (60S ribosomal protein L2)	1/1	66	4	28381	<i>Dichantheium oligosanthes</i>
<b>99/ALP06207.1/</b> NCBIprot	TPI (Triosephosphate isomerase)	4/2	332	24	27181	<i>Saccharum officinarum</i>
<b>100/AQK53814.1/</b> NCBIprot	Proteasome subunit alpha type	1/1	75	7	26176	<i>Zea mays</i>
<b>101/AQL07484.1/</b> NCBIprot	<sup>a</sup> Ascorbate peroxidase-like protein	2/1	114	14	26128	<i>Zea mays</i>
<b>102/NP_001148765.1/</b> NCBIprot	Endo-1,3-1,4-beta-D-glucanase	1/1	79	7	25930	<i>Zea mays</i>
<b>103/ACT53877.1/</b> NCBIprot	Superoxide dismutase (Manganese superoxide dismutase)	1/1	62	6	25327	<i>Saccharum officinarum</i>
<b>104/NP_001288419.1/</b> NCBIprot	60S ribosomal protein L6	1/1	81	6	24273	<i>Zea mays</i>
<b>105/CFI_MAIZE/</b> SwissProt	<sup>a</sup> Chalcone--flavonone isomerase	1/1	66	5	24406	<i>Zea mays</i>
<b>106/PSB3_ORYSJ/</b> SwissProt	Proteasome subunit beta type	1/1	108	8	23186	<i>Oryza sativa Japonica Group</i>
<b>107/CDI66516.1/</b> NCBIprot	<sup>a</sup> CBS domain-containing protein CBSX3, mitochondrial	1/1	54	5	22531	<i>Saccharum hybrid cultivar R570</i>
<b>108/KHN33624.1/</b> NCBIprot	Flavoprotein wrbA	1/1	56	5	22104	<i>Glycine soja</i>
<b>109/BAK01663.1/</b> NCBIprot	<sup>a</sup> Predicted protein – Peptideo: AVSTAIYFLLPAGSVSR (No characterized on UniProtKB)	1/1	57	8	21657	<i>Hordeum vulgare subsp. vulgare</i>
<b>110/EMT08544.1/</b> NCBIprot	Small GTPase superfamily	2/1	133	13	21365	<i>Aegilops tauschii</i>
<b>111/AQK49277.1/</b> NCBIprot	<sup>a</sup> Glycine cleavage system H protein 2 mitochondrial	1/1	57	8	19476	<i>Zea mays</i>

**Table 1-S.** Cont.

<sup>a</sup> Proteins detected only in germinative axillary buds.

N°/Accession or protein ID/Database	Description	N° of match/unique	Mascot Score	Protein Sequence Coverage (%)	Monoisotopic Mass (Mr) (Da)	Species
<b>112</b> /AGT16090.1/ NCBIprot	Cyclophilin	3/2	167	23	18610	<i>Saccharum</i> hybrid cultivar R570
<b>113</b> /AGT16537.1/ NCBIprot	60S ribosomal protein L12	1/1	64	9	17807	<i>Saccharum</i> hybrid cultivar R570
<b>114</b> /AHX42566.1/ NCBIprot	<sup>a</sup> Translation initiation factor 5A	1/1	61	7	17671	<i>Saccharum</i> hybrid cultivar ROC22
<b>115</b> /ACG31943.1/ NCBIprot	<sup>a</sup> Hypothetical protein – Peptideo: STGFVWLR (No characterized on UniProtKB)	1/1	60	4	17568	<i>Zea mays</i>
<b>116</b> /XP_002446634.1/ NCBIprot	<sup>a</sup> Hypothetical protein (Major latex protein – UniProtKB)	1/1	51	10	17385	<i>Sorghum bicolor</i>
<b>117</b> /AGD80596.1/ NCBIprot	Chloroplast copper/zinc-superoxide dismutase	1/1	58	7	15194	<i>Saccharum</i> hybrid cultivar GT28
<b>118</b> /EMT30334.1 / NCBIprot	Peroxiredoxin-2E, chloroplastic	1/1	96	20	9219	<i>Aegilops tauschii</i>

**Table 2-S.** Total and differential proteoma in dormant axillary buds of sugarcane RB67515 in the second ratoon.

N°/Acession or protein ID/Database	Description	N° of match/unique	Mascot Score	Protein Sequence Coverage (%)	Monoisotopic Mass (Mr) (Da)	Species
1/CLH1_ORYSJ/SwissProt	Clathrin heavy chain 1	2/2	129	1	194534	<i>Oryza sativa</i> Japonica Group
2/KHG02463.1/NCBIprot	<sup>b</sup> Splicing factor 3B subunit 3	1/1	64	1	136932	<i>Gossypium arboreum</i>
3/AQK56897.1/NCBIprot	<sup>b</sup> Ubiquitin-activating enzyme E1 2	2/2	122	3	113801	<i>Zea mays</i>
4/XP_002466572.1/NCBIprot	<sup>b</sup> Hypothetical protein (Exportin-2 – UniProtKB)	1/1	49	1	108812	<i>Sorghum bicolor</i>
5/ONM35737.1/NCBIprot	Lipoxygenase 2	1/1	70	1	99495	<i>Zea mays</i>
6/OEL19258.1/NCBIprot	<sup>b</sup> Aminopeptidase M1-A	1/1	58	1	98281	<i>Dichantheium oligosanthos</i>
7/OEL20031.1/NCBIprot	Elongation factor 2	4/2	325	9	94808	<i>Dichantheium oligosanthos</i>

N°/Accession or protein ID/Database	Description	N° of match/unique	Mascot Score	Protein Sequence Coverage (%)	Monoisotopic Mass (Mr) (Da)	Species
8/AGI56230.1/ NCBIprot	Sucrose synthase	2/2	142	2	93492	<i>Saccharum officinarum</i>
9/PLDA1_MAIZE/ SwissProt	Phospholipase D alpha 1	2/2	124	4	92640	<i>Zea mays</i>
10/CDC48_SOYBN/ SwissProt	<sup>b</sup> Cell division cycle protein 48 homolog	1/1	55	2	90512	<i>Glycine max</i>
11/KXG24059.1/ NCBIprot	Hypothetical protein (5-methyltetrahydropteroyltriglutamate--homocysteine methyltransferase – UniProtKB)	6/4	473	14	84696	<i>Sorghum bicolor</i>
12/TKTC_SPIOL/ SwissProt	Transketolase, chloroplastic	1/1	70	1	80744	<i>Spinacia oleracea</i>
13/AGC60019.1/ NCBIprot	Heat shock protein 90 (HSP90)	2/2	104	3	80355	<i>Saccharum</i> hybrid cultivar SP80-3280
14/EMT20627.1/ NCBIprot	Eukaryotic translation initiation factor 3 subunit B	1/1	63	1	80211	<i>Aegilops tauschii</i>

**Table 2-S.** Cont.

<b>15</b> /XP_004982450.1/ NCBIprot	<sup>b</sup> Predicted: Subtilisin-like protease SBT1.7	1/1	65	1	79634	<i>Setaria italica</i>
<b>16</b> /AGI37887.1/ NCBIprot	Phenylalanine ammonia-lyase	2/2	141	3	76080	<i>Saccharum</i> hybrid cultivar CP69-1062
<b>17</b> /AQK72170.1/ NCBIprot	<sup>b</sup> Glycerophosphodiester phosphodiesterase GDPDL3	1/1	59	1	74087	<i>Zea mays</i>
<b>18</b> /AGT15890.1/ NCBIprot	Luminal-binding protein (Heat shock 70 kDa protein BIP1)	1/1	78	2	73312	<i>Saccharum</i> hybrid cultivar R570
<b>19</b> /AIA22210.1/ NCBIprot	Heat shock protein 70 (Mediator of RNA polymerase II transcription subunit 37)	6/0	413	15	71209	<i>Chrysanthemum indicum</i>
<b>20</b> /VATA_ARATH/ SwissProt	V-type proton ATPase catalytic subunit A	1/1	67	1	69111	<i>Arabidopsis thaliana</i>
<b>21</b> /KHN09015.1/ NCBIprot	Glucose-6-phosphate isomerase	1/1	68	1	67834	<i>Glycine soja</i>
<b>22</b> /AAB94293.1/ NCBIprot	Polyphenol oxidase	3/3	182	7	67709	<i>Saccharum</i> hybrid cultivar
<b>23</b> /AFO64345.1/ NCBIprot	<sup>b</sup> ATP-citrate synthase beta chain protein 1	1/1	58	2	66539	<i>Saccharum</i> hybrid cultivar GT28
<b>24</b> /A2XF13.2/ NCBIprot	Pyruvate decarboxylase 2	2/2	171	4	65889	<i>Oryza sativa</i> Indica Group
<b>25</b> /XP_002467709.1/ NCBIprot	Hypothetical protein (putative nucleoredoxin 1-1, partial – UniProtKB)	2/2	135	5	65476	<i>Sorghum bicolor</i>
<b>26</b> /AGT16432.1/ NCBIprot	Phosphoglucomutase	2/2	145	8	63202	<i>Saccharum</i> hybrid cultivar R570

<b>27</b> /CH60A_ARATH/ NCBIprot	Chaperonin CPN60, mitochondrial (HSP60)	1/1	54	1	61584	<i>Arabidopsis thaliana</i>
<b>28</b> /XP_015630507.1/ NCBIprot	<sup>b</sup> Predicted: ruBisCO large subunit-binding protein subunit alpha	2/2	153	5	61477	<i>Oryza sativa</i> Japonica Group
<b>29</b> /TCPH_ARATH/ SwissProt	<sup>b</sup> T-complex protein 1 subunit eta	1/1	50	3	60195	<i>Arabidopsis thaliana</i>
<b>Table 2-S.</b> Cont.						
N°/Accession or protein ID/Database	Description	N° of match/unique	Mascot Score	Protein Sequence Coverage (%)	Monoisotopic Mass (Mr) (Da)	Species
<b>30</b> /BAB92019.1/ NCBIprot	<sup>b</sup> Mitochondrial aldehyde dehydrogenase	1/1	74	2	59521	<i>Sorghum bicolor</i>
<b>31</b> /OEL37085.1/ NCBIprot	ATP synthase subunit beta, mitochondrial	3/2	202	8	58741	<i>Dichanthelium oligosanthes</i>
<b>32</b> /IMA1A_ORYSJ/ SwissProt	<sup>b</sup> Importin subunit alpha	1/1	63	3	58162	<i>Oryza sativa</i> Japonica Group
<b>33</b> /THRC_SOLTU/ SwissProt	<sup>b</sup> Threonine synthase, chloroplastic	1/1	53	3	58003	<i>Solanum tuberosos</i>
<b>34</b> /AIY34491.1/ NCBIprot	<sup>b</sup> Glucose-6-phosphate dehydrogenase	1/1	56	1	57923	<i>Saccharum</i> hybrid cultivar Yacheng05-179
<b>35</b> /3FR7_A/ NCBIprot	Chain A, Ketol-Acid Reductoisomerase (Kari) In Complex with Mg <sup>2+</sup>	1/1	99	3	57566	<i>Oryza sativa</i> Japonica Group
<b>36</b> /AAC03055.1/ NCBIprot	<sup>b</sup> Methylmalonate semi-aldehyde dehydrogenase	1/1	54	1	57514	<i>Oryza sativa</i> Japonica Group

<b>37</b> /AHZ13843.1/ NCBIprot	Catalase	2/2	144	6	56820	<i>Saccharum</i> hybrid cultivar Yacheng05-179
<b>38</b> /ADP02192.1/ NCBIprot	Putative non-cyanogenic beta-glucosidase	1/1	67	3	56692	<i>Triticum aestivum</i>
<b>39</b> /AAO45821.1/ NCBIprot	<sup>b</sup> Gamma-glutamylcysteine synthetase	1/1	79	6	56232	<i>Lotus japonicus</i>
<b>40</b> /OEL32960.1/ NCBIprot	Leucine aminopeptidase 2, chloroplastic	2/2	143	7	55748	<i>Dichantheium oligosanthes</i>
<b>41</b> /AGZ15751.1/ NCBIprot	Betaine-aldehyde dehydrogenase 2	2/2	130	8	55590	<i>Sorghum bicolor</i>
<b>42</b> /AQK64652.1/ NCBIprot	Putative serine protease	1/1	56	2	55538	<i>Zea mays</i>
<b>43</b> /AMYB_MAIZE/ SwissProt	Beta-amylase	1/1	69	3	55487	<i>Zea mays</i>

**Table 2-S.** Cont.

N°/Accession or protein ID/Database	Description	N° of match/unique	Mascot Score	Protein Sequence Coverage (%)	Monoisotopic Mass (Mr) (Da)	Species
<b>44</b> /YP_009295487.1/ NCBIprot	<sup>b</sup> ATPase subunit 1	1/1	110	4	55435	<i>Saccharum officinarum</i>
<b>45</b> /OEL38131.1/ NCBIprot	UDP-N-acetylglucosamine diphosphorylase 1	1/1	67	2	55251	<i>Dichantheium oligosanthes</i>
<b>46</b> /AAM80479.1/ NCBIprot	<sup>b</sup> Hexokinase	1/1	57	3	54953	<i>Zea mays</i>
<b>47</b> /AMS36872.1/ NCBIprot	Aldehyde dehydrogenase	1/1	50	2	54885	<i>Saccharum spontaneum</i>
<b>48</b> /VATB1_ARATH/ SwissProt	V-type proton ATPase subunit B1	1/1	54	2	54188	<i>Arabidopsis thaliana</i>
<b>49</b> /AGT16642.1/ NCBIprot	Adenosylhomocysteinase	2/2	160	5	53888	<i>Saccharum</i> hybrid cultivar R570
<b>50</b> /UGDH1_ARATH/ SwissProt	UDP-glucose 6-dehydrogenase 1	1/1	61	2	53565	<i>Arabidopsis thaliana</i>
<b>51</b> /ACG28578.1/ NCBIprot	<sup>b</sup> Cytochrome P450 CYP74A19	1/1	62	3	53357	<i>Zea mays</i>
<b>52</b> /XP_002444986.1/ NCBIprot	Hypothetical protein (Glycosyltransferase – UniProtKB)	2/2	106	9	53225	<i>Sorghum bicolor</i>
<b>53</b> /6PGD1_ORYSJ/ SwissProt	6-Phosphogluconate dehydrogenase, decarboxylating 1	2/2	149	6	52973	<i>Oryza sativa</i> Japonica Group
<b>54</b> /ACL80329.1/ NCBIprot	UDP-glucose pyrophosphorylase	8/3	573	26	52431	<i>Saccharum officinarum</i>



NCBIprot						
55/AGT15905.1/ SwissProt	<sup>b</sup> Serine hydroxymethyltransferase 4	2/2	146	9	52087	<i>Saccharum</i> hybrid cultivar R570
56/KFK27018.1 / NCBIprot	<sup>b</sup> Hypothetical protein (Homogentisate 1,2-dioxygenase – UniProtKB)	1/1	58	3	52046	<i>Arabis alpina</i>
57HISX_ORYSJ / SwissProt	<sup>b</sup> Histidinol dehydrogenase, chloroplastic	1/1	53	3	50990	<i>Oryza sativa</i> Japonica Group
58/ENO_ORYSJ/ SwissProt	Enolase	3/3	236	11	48285	<i>Oryza sativa</i> Japonica Group

**Table 2-S.** Cont.

N°/Accession or protein ID/Database	Description	N° of match/unique	Mascot Score	Protein Sequence Coverage (%)	Monoisotopic Mass (Mr) (Da)	Species
59/KXG22883.1/ NCBIprot	Hypothetical protein (apyrase – UniProtKB)	1/1	81	3	48195	<i>Sorghum bicolor</i>
60/OEL34186.1/ NCBIprot	Transaldolase	2/2	138	6	46320	<i>Dichantheium oligosanthes</i>
61/ICDHC_ARATH/ SwissProt	<sup>b</sup> Cytosolic isocitrate dehydrogenase [NADP]	1/1	59	4	46059	<i>Arabidopsis thaliana</i>
62/AQK76036.1/ NCBIprot	<sup>b</sup> Glutathione reductase cytosolic	1/1	57	3	44633	<i>Zea mays</i>
63/XP_002447121.1/ NCBIprot	<sup>b</sup> Hypothetical protein	2/2	125	7	44388	<i>Sorghum bicolor</i>

NCBIprot	(Aminomethyltransferase – UniProtKB)					
<b>64</b> /ONM15574.1/ NCBIprot	Isopropylmalate dehydrogenase 2	1/1	62	3	43132	<i>Zea mays</i>
<b>65</b> /OEL23402.1/ NCBIprot	Phosphoglycerate kinase, cytosolic	3/1	180	11	42504	<i>Dichantheium oligosanthes</i>
N°/Accession or protein ID/Database	Description	N° of match/unique	Mascot Score	Protein Sequence Coverage (%)	Monoisotopic Mass (Mr) (Da)	Species
<b>66</b> /XP_002464260.1/ NCBIprot	Hypothetical protein (Alpha-1,4-glucan-protein synthase – UniProtKB)	3/2	220	14	41964	<i>Sorghum bicolor</i>
<b>67</b> /KXG39210.1/ NCBIprot	Hypothetical protein (Acetyl-CoA acetyltransferase – UniProtKB)	1/1	61	4	41564	<i>Sorghum bicolor</i>
<b>68</b> /OEL24402.1/ NCBIprot	3-hydroxyisobutyryl-CoA hydrolase-like protein 5, partial	1/1	72	3	41366	<i>Dichantheium oligosanthes</i>
<b>69</b> /AAQ67347.1/ NCBIprot	Caffeic acid 3-O-methyltransferase	3/3	163	14	39824	<i>Saccharum hybrid cultivar</i>
<b>70</b> /BAI59774.1/ NCBIprot	Aldolase C-1 (Fructose-bisphosphate aldolase cytoplasmic isozyme)	5/5	320	16	39228	<i>Phyllostachys edulis</i>
<b>71</b> /AQL07627.1/ NCBIprot	<sup>b</sup> UDP-glucuronic acid decarboxylase	1/1	49	3	39116	<i>Zea mays</i>
<b>72</b> /XP_004960754.1/ NCBIprot	Predicted: 2-alkenal reductase (NADP(+)-dependent)-like	1/1	60	3	38880	<i>Setaria italica</i>

**Table 2-S.** Cont.

<b>73</b> /ONM34317.1/ NCBIprot	Peroxidase	2/2	101	5	38522	<i>Zea mays</i>
<b>74</b> /XP_002440480.1/ NCBIprot	Hypothetical protein (Legumin-like protein – UniProtKB)	1/1	75	3	38091	<i>Sorghum bicolor</i>
<b>75</b> /OEL25000.1/ NCBIprot	Ribokinase	1/1	70	3	37603	<i>Dichantheium oligosanthes</i>
<b>76</b> /GBLPA_ORYSJ/ SwissProt	Guanine nucleotide-binding protein subunit beta-like protein A	2/2	157	9	36665	<i>Oryza sativa</i> Japonica Group
<b>77</b> /AEP31954.1/ NCBIprot	Glyceraldehyde-3-phosphate dehydrogenase	3/2	214	12	36586	<i>Aeluropus lagopoides</i>
<b>78</b> /CAB40376.1/ NCBIprot	Adenosine kinase, partial	2/2	132	7	36465	<i>Zea mays</i>
<b>79</b> /NP_001142100.1/ NCBIprot	Malate dehydrogenase	3/2	292	18	35492	<i>Zea mays</i>
<b>80</b> /JAEA11483.1/ NCBIprot	Beta-1,3-glucanase	1/1	66	5	35987	<i>Zea mays</i>
<b>81</b> /APF31922.1/ NCBIprot	Putative fructokinase	3/1	203	13	34865	<i>Saccharum spontaneum</i>
<b>82</b> /SUCA_ORYSJ/ SwissProt	<sup>b</sup> Succinate--CoA ligase [ADP-forming] subunit alpha, mitochondrial	1/1	66	3	34567	<i>Oryza sativa</i> Japonica Group
<b>83</b> /ONM12595.1/ NCBIprot	<sup>b</sup> 26S proteasome non-ATPase regulatory subunit 7 homolog A	1/1	51	3	34543	<i>Zea mays</i>
<b>84</b> /CYSK_MAIZE/ SwissProt	Cysteine synthase	1/1	55	3	34299	<i>Zea mays</i>

<b>85/OEL25171.1/</b> NCBIprot	<sup>b</sup> NADH-cytochrome b5 reductase-like protein	1/1	58	3	34201	<i>Dichantheium oligosanthes</i>
<b>86/NP_001144369.1/</b> NCBIprot	<sup>b</sup> Uncharacterized protein (Phosphoenolpyruvate carboxylase family protein – UniProtKB)	2/2	125	9	33588	<i>Zea mays</i>

**Table 2-S.** Cont.

N°/Acession or protein ID/Database	Description	N° of match/unique	Mascot Score	Protein Sequence Coverage (%)	Monoisotopic Mass (Mr) (Da)	Species
<b>87/AHA90807.1/</b> NCBIprot	<sup>b</sup> Allylphenol synthase 1	1/1	75	3	33440	<i>Piper regnellii</i>
<b>88/AHF18211.1/</b> NCBIprot	Glyoxylase	1/1	58	3	33005	<i>Saccharum</i> hybrid cultivar
<b>89/IFRH_MAIZE/</b> SwissProt	<sup>b</sup> Isoflavone reductase homolog IRL	1/1	59	3	32831	<i>Zea mays</i>
<b>90/AQK79360.1/</b> NCBIprot	Aspartic proteinase	2/2	130	9	32615	<i>Zea mays</i>
<b>91/OAY73755.1/</b> NCBIprot	<sup>b</sup> Enoyl-(acyl-carrier-protein) reductase (NADH) 1, chloroplastic	1/1	54	4	32591	<i>Ananas comosus</i>
<b>92/XP_010668582.1/</b> NCBIprot	Predicted: Tubulin alpha-1 chain-like, partial	1/1	78	7	32155	<i>Beta vulgaris</i> subsp. <i>vulgaris</i>

<b>93</b> /XP_020160272.1/ NCBIprot	<sup>b</sup> Aldo-keto reductase Family	1/1	52	3	31033	<i>Aegilops tauschii</i> <i>subsp. tauschii</i>
<b>94</b> /NP_001149085.1/ NCBIprot	Proteasome subunit alpha type 1	1/1	80	4	30282	<i>Zea mays</i>
<b>95</b> /AFC16425.1/ NCBIprot	Beta-tubulin, partial	1/1	55	4	30073	<i>Helicosporidium sp. ex</i> <i>Cyrtobagous</i>
<b>96</b> /EES06920.2/ NCBIprot	<sup>b</sup> Hypothetical protein (2-cys peroxiredoxin BAS1 – UniProtKB)	1/1	49	5	28236	<i>Sorghum bicolor</i>
<b>97</b> /ALP06207.1/ NCBIprot	TPI (Triosephosphate isomerase)	3/2	203	14	27181	<i>Saccharum officinarum</i>
<b>98</b> /AAC63379.1/ NCBIprot	Manganese superoxide dismutase	1/1	79	6	26317	<i>Zantedeschia aethipica</i>
<b>99</b> /NP_001288419.1/ NCBIprot	60S ribosomal protein L6	1/1	71	6	24273	<i>Zea mays</i>
<b>100</b> /RAA1A_ARATH/ SwissProt	Small GTPase superfamily	1/1	54	5	24083	<i>Arabidopsis thaliana</i>

**Table 2-S.** Cont.

N°/Accession or protein ID/Database	Description	N° of match/unique	Mascot Score	Protein Sequence Coverage (%)	Monoisotopic Mass (Mr) (Da)	Species
<b>101</b> /GSTF1_MAIZE/SwissProt	<sup>b</sup> Glutathione S-transferase 1	1/1	68	9	24034	<i>Zea mays</i>
<b>102</b> /XP_018721988.1/NCBIprot	<sup>b</sup> Predicted: Aspartate--tRNA ligase 2, cytoplasmic-like	1/1	70	6	22889	<i>Eucalyptus grandis</i>
<b>103</b> /ACG33557.1/NCBIprot	<sup>b</sup> Thioredoxin family Trp26	1/1	54	6	22747	<i>Zea mays</i>
<b>104</b> /AQL06651.1/NCBIprot	<sup>b</sup> Nascent polypeptide-associated complex alpha subunit-like protein	1/1	71	6	22031	<i>Zea mays</i>
<b>105</b> /ABS10822.1/NCBIprot	Elongation factor 1-alpha, partial	1/1	49	5	21867	<i>Phaseolus vulgaris</i>
<b>106</b> /KHN19077.1/NCBIprot	Flavoprotein wrbA; NAD(P)H dehydrogenase (quinone) FQR1; Quinone reductase family protein	1/1	76	5	21113	<i>Glycine soja</i>
<b>107</b> /KXG22950.1/NCBIprot	<sup>b</sup> Hypothetical protein (Stem-specific protein TSJT1 – UniProtKB)	2/2	113	18	19102	<i>Sorghum bicolor</i>
<b>108</b> /AQL09206.1/NCBIprot	<sup>b</sup> Eukaryotic translation initiation factor 3 subunit K	1/1	53	6	18901	<i>Zea mays</i>
<b>109</b> /AQK80297.1/NCBIprot	Proteasome subunit beta type	2/2	145	18	18733	<i>Zea mays</i>
<b>110</b> /BAM13284.1/NCBIprot	Cyclophilin	3/1	206	22	18610	<i>Oryza officinalis</i>

<b>111</b> /AGT16537.1/ NCBIprot	60S ribosomal protein L12	2/1	127	14	17807	<i>Saccharum</i> hybrid cultivar R570
<b>112</b> /AGD80596.1/ NCBIprot	Chloroplast copper/zinc-superoxide dismutase	1/1	75	7	15194	<i>Saccharum</i> hybrid cultivar GT28
<b>113</b> /EMT30334.1/ NCBIprot	Peroxiredoxin-2E, chloroplastic	1/1	52	20	9219	<i>Aegilops tauschii</i>

<sup>b</sup> Proteins detected only in dormant axillary buds.