

121 LPFNQLSTLNLAAYLQQQLLPFSQLATAYSQQQQFLPFNQLAALNPAAAYLQQQILLPFGQ
181 LATTNRASFLTQQQLLPFYQQFSANPATLLQLQQLLPFVQLALTNPAAFYQQHIIGGAIF

26.99 KDa zein protein

1 MATKILLSLLALLFASATNASIIPOCSLAPSSIIPOFLPPVTSMAFEHPAVQAYRLQQA
61 IAASVLQQPIAQLQQQSLAHLTIQTIATQQQQQLPALSHLAMVNPVAYLQQQLLASNP
121 ALANVVANQQQQQLQQFLPALSQLAMVNPAAAYLQQQQLSSSPLAVANAPTYLQQELLQQ
181 IVPALTQLAVANPVAYLQQQLPFNQLTMSNSVAYLQQRQQLNPLAVANPLVA AFLQQQQ
241 LLPYNRFSLMNPVLSRQQPIVGGAI

Gamma zein.

1 ASATSTHTSGGCGCQPPPPVHLPPPVLHPPPVLHPPPVLHPPPVLHPPPVLHPPPVLHPPP
61 PVHLPPPCHYPTQPPRPQHPQHPQPCQPPHPSPCQLQGTGCGVSTPILGQCVEFLRH
121 QCSPTATPYCSPQCQSLRQCCQQLRQVEPQHRYQAIFGLVLSILQQQPQSGQVAGLLA
181 AQIAQQLTAMCGLQQPTPCPYAAAGGVPH

Zein-beta precursor (Zein-2) (16 kDa) (Zein ZC1).

1 MKVLIVALALLALAASAASSTSGGCGCQTPPFHLPPPFYMPPPFYLPPQQQPQWQYPTQ
61 PPQLSPCQQFGSCGVSQVSPFLGQCVEFLRHQCSPAATPYGSPQCQALQQQCCHQIRQV
121 EPLHRYQATYGVVLQSFLQQQPQGELAAALMAAQVAQQLTAMCGLQLQPGPCPCNAAAGG
181 VYY

HORDEUM VULGARE (BARLEY)

Extensin [Hordeum vulgare].

1 VEARPGSGYGGGHPPSPPTPISPAKHEKPPKGHKPPHHHHHAKPPVGSQAPPPTYSPTAK
61 PTPAPKAPPTYAPIKPPKPSPPAYHPTPKAPPTYKPPTQPKSPPAYKAPKVSPP
121 AYKAPKVSPPAYKAPKVSPPAYKAPKVSPPAYKSPKVSPPAYKAPKVSPPAYKAP
181 PKVSPPAYKAPKVSPPAYKVPKPSPPAKPTPPPYKPPTPTPPAQKPTPTPPAYKPP
241 TPTPAHKPPTPTPAHKPATPTPAHKPPTPTPAHKPTTPTPAYKPTPTPADKPT
301 PTPLAHKPPTPTPAYKAPTSPPPPPYHH

C-hordein [Hordeum vulgare].

1 MKTFLTFLVLLAMVMSIVTTARQLNPSSQELQSPQQSYLQQPYQNPYLQQQFPVQQPFH
61 TPQQYFYLPEELSPQYQIPTLQPPQFPQQPQQPLPRPQQFPWQPPQFPQPPQPI
121 YPQQQPFNQPPQQIISQPPQPPFPQQPQQFPQPPQFPWQPPQFPQPPQPFLLQPPQ
181 FPWQPPQFPQPPQPIAHQPPQPFSSFSQQPPQFPPLQPPQFPQPPQFPQPPQPIIFQ
241 QPQQSYVPVQPPQFPQPPVQQRPPQASPLQPPQFPQGGSEQIIPQQPQPPFLLQPHQP
301 YTQQTIWSMV

AVENIN STRUCTURES [OATS - Avena sativa)

Avenin

1MKTFLIFALL AMAATMATAQ FDPSEQYQPYPEQQQPILOQ QMMLLQQQQQ QMMLLQQQPLL
61 QVLQQQLNRC RQFLVQQCSP VAVVPFLRSQ ILQSSCQVM RQCCCRQLEQ IPEQLRCPAM
121 HSVVQAIMQ QQQFFQPQMQ QVTQGIFQPQ MQQVTQGIQ PQLQQVTQGI FQPQMGGQIE
181 GMRAFALQAL PAMCDVYVPPHCPVATAPLG GF

Gamma-3 Avenin

TTTVQYDPSEQYQPYPEQQQPFVQQQPPF

ORYZA SATIVA (RICE)

Prolamin [Oryza sativa Indica Group]

1 MAAYTSKIFALFALIASASATTAITTMQYFPPTLAMGMTMDPCRQYMMQTLGMGSSTAMF
61MSQPMALLQQQCCMQLQGMMPOCHCGTSCQMMQSMQVICAGLGQQQMMKMMAMQM P YMCN
121 MAPVNFQLSSCGCC

Prolamin [Oryza sativa Japonica Group]

1 MKIIFV FALLAIVA CNASARFDALSQSYRQYQLQSHLQLQQQLSPCSEFVRQQHSIVAT
61 PFWQPATFQLINNQVMQQQCCQQLRLVAQQSHYQAISVQAIVQQLQLQQVGVVYFDQQT
121 AQAQALLALNLP S ICGIYPNYYIAPRSIPTVGVSGTEL

Glutelin [*Oryza sativa*]

1 MASSVFSRFSIYFCVLLLLCHGSM AQLFNPSTNPWHSPRQGSFRECRFDRLQAFEP L R K V R
61 SEAGVTEYFDEKNELFQCTGTFVIRRVIQPQGLLVPRYTNIPGVVYIIQGRGSMGLTFPG
121 CPATYQQQFQQFSSQGGQSQSQKFRDEHQKIHQFRQGDIVALPAGVAHWFYNDGDRHIVAV
181 YVYDVNNNANQLEPRQKEFLLAGNNNRAQQQQVYGSSIEQHSGQNIFSGFGVEMLSEALG
241 INAVAAKRLQSPNDQRGEIHHVKNGLQLLKPTLTQQQEQAQAQDQYQQVQYSERQQTSSR
301 WNGLEENFC TIKVRVNIENPSRADSYNPRAGRITSVNSQKFPILNLIQMSATRVNLYQNA
361 ILSPFWNVNAHSLVYMIQGRSRVQVVSNFGKTVFDGVL R P G Q L L I I P Q H Y A V L K K A E R E G
421 CQYIAIKTNANTFVSHLAGKNSVFRALPVDVVANAYRISREQARSLKNNRGEEHGAF T P R
481 FQQQYYPGLSNESESE T S E

P proline **P** where ginger enzymes digest protein