

Chicken non-histone chromosomal protein HMG-17 cDNA sequence

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We have screened a chicken embryo lambda gt11 cDNA library (Clontech Laboratories, Inc.) with the human non-histone chromosomal protein HMG-17 cDNA (1). The insert was isolated and cloned in a pUC13 vector at the EcoR1 site and was called pC17c. The sequence of the purified insert was determined by dideoxy sequencing (2) of shotgun M13 clones produced by the method of Deininger (3) and is shown in Figure 1. The deduced amino acid sequence differs from the published protein sequence at 2 positions. At residue 77 an Asp is in the deduced sequence whereas there is an Asn in the protein sequence. Similarly, there is a Gln residue at position 80 of the deduced sequence as opposed to a Glu in the protein sequence (see the underlined residues in Figure 1).

1

GAATTCGGCCAGCGCAGCGAGCCGGCCGAGCCCGCCGCGCCCGCCTCTCCCCCTCGGCCCTCCCCCGCT
TCTGCGCCGACCGAGCGAGCCGGCTGCCCGCCCGCCCGCCCGCTCGCTCTCTCCCTCCTCGCACAA
CACACGCGCGCCCGCCGGAGCTATGCGCAAGAGAAAGGCTGAAGGAGATACCAAGGGCGATAAGGCCAAAGTT
ProLysArgLysAlaGluGlyAspThrLysGlyAspLysAlaLysVal
AAGGATGAGCCACAAOGGAGATCGGCAAGGTTATCTGCTAAACCTGCCCGCTCGAAGCCAGAGCTAAACCTAAA
LysAspGluProGlnArgArgSerAlaArgLeuSerAlaLysProAlaProProLysProGluProLysProLys
AAGCAGCTCCAAAGAACAGGTGAGCAAGGTGCCAAGGGAAGAGGGGAAAGCTGATGCTGGCAAGGCGGAAAC
LysAlaAlaProLysLysSerGluLysValProLysGlyLysLysGlyLysAlaAspAlaGlyLysGluGlyAsn
AACCTGCGAAAAATGGAGATGCCAAAAACAGACCAGGCCAGAAAGCCGAGGTCCTGGTGATGCCAAGTAAAT
AsnProAlaGluAsnGlyAspAlaLysThrAspGlnAlaGlnLysAlaGluGlyAlaGlyAspAlaLys
GTTGGAATTTTTGATAAATGTTACTCTCIGGTGACTGTACAGTTTGAATACTATTTTTTATCAAGTTTTTATAAC
AATGCGAATTTTTGTTTTACTTTTTTTTTAAGCTATGTTGTTAGCACACAGACCGCTTTGTTGTTGTTTTGAGG
GGGGGGCAGTGGGACAAAACGTCACITTAATCTGTTTTCTTGGAACTAAATTTTAAAAGTTTTACCCCTTCCCAGTTT
TTTTAGAAGGACTCTTCTAAATGGAGCAGGAAGGGATTCTTCTGCTGTCACACCTCTTCOGTTTTTGTGGACCG
ATCAGAGTGAACCGAAGCTCCCGAGATGCCCTGTTGCAACTTCAGAACTGCAGTTTTCAGTGGCCCTCTGCGTTTC
CTTTTCATGCCCTTCCCTTTTTTGCCTAGAGCCTATCACTCCGAAATACAGCAGACATGGCATGTTGGGACTCACCAC
TCTAAATGCAITGTCAGGTGATCTCGGACTCTCTGGTGTCTAATTTGGGATATAATAGCTCTAAAAGGAGCTGCAIT
TCCCTCTTCATATTGTAGATCTACAGATTAAGGAATCTGCAGTTTTTAAATTTTTCTCGCAAAGTCAGGGTAGAT
TTGTGAAGAGTTGTTAAACAACATGCTAAATGTGAAAGTGTCCGCCCTCACCTAAACATTTTCCCTCTACAAAGTA
TACAAAAATGAAGATTTGTGGTTTTATAGCAACCTTTATGTTTGGGTAGTCCATGAAGGGAGGGGAGTTTTGACA
GTTGTTGTAATAATGTTGCAGATTGTAGGCCATGTCTCGCTAAATTAACCATGATGTTTATGAAAAGTACCTTTA
ATAAAGCTGGATAACGTTTTGGCTTGGAAAAAATAAAAAAAAAAAGCGAATTC 1327

Figure 1. Sequence of the cDNA coding for chicken HMG-17.
Each line is 75 nucleotides.

References.

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