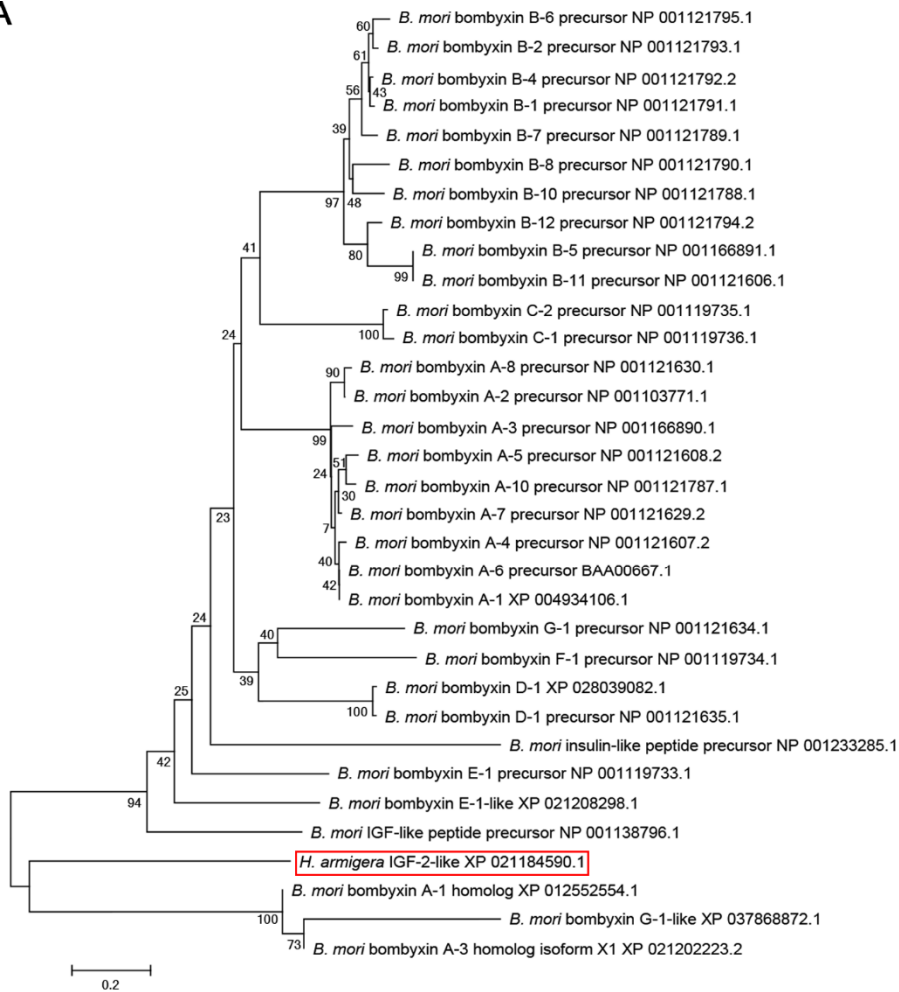
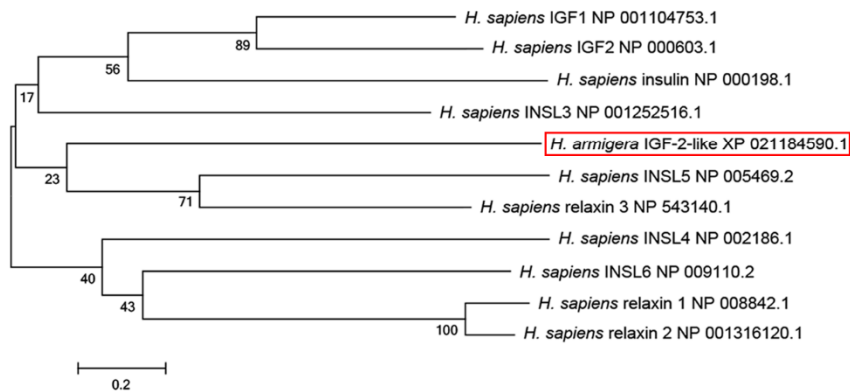


Supplementary Figure and Figure legends

A



B



C

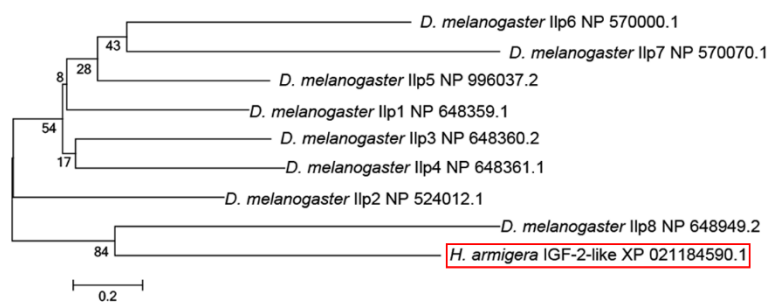


Figure S1. MAGE 5 analysis of the phylogenetic tree of ILPs in *B. mori*, *D. melanogaster*, and *H. sapiens*. (A) Phylogenetic tree of *B. mori* ILPs. (B) Phylogenetic tree of ILPs in *D. melanogaster*. (C) Phylogenetic tree of *H. sapiens* ILPs. The red box denotes IGF-2-like.

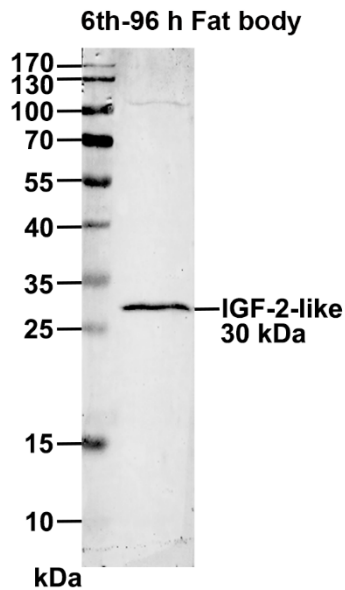


Figure S2. Antibody specific detection of IGF-2-like in the 6th instar larval (6th-96 h) fat body.

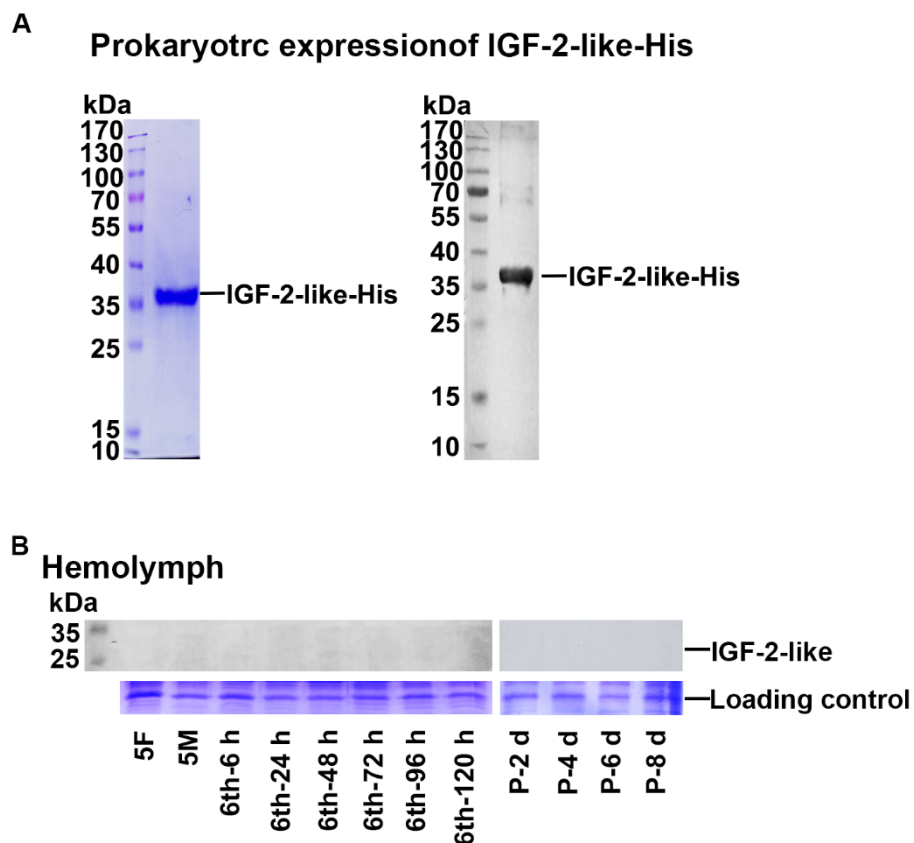


Figure S3. (A) SDS-PAGE (left) and western blotting (right) were used to detect the recombinant of IGF-2-like-His overexpressed in *E. coli* from plasmid pET-30a. The gel concentration was 12.5%. (B) The protein level of IGF-2-like in the hemolymph at different stages.

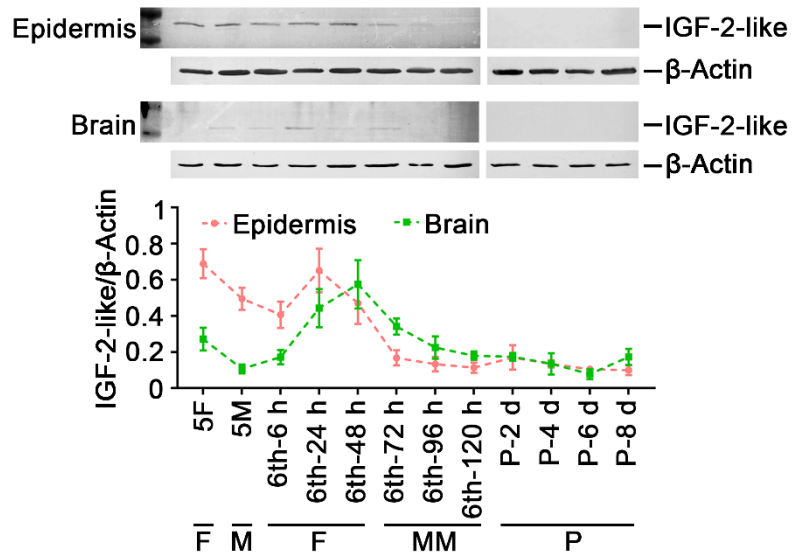


Figure S4. Expression profiles of IGF-2-like in the epidermis and brain. ACTB was used as an internal reference protein. The concentration of the gel was 12.5%. Image J was used to calculate the ratio of IGF-2-like and ACTB band densities. All the experiments were performed using three biological replicates. The error bar indicates the mean \pm SD. 5F: the 5th instar feeding stage; 5M: the 5th molting stage; 6th-6 h, 6th-24 h, 6th-48 h, 6th-72 h, 6th-96 h, and 6th-120 h correspond to different stages of the 6th instar; P-2 d, P-4 d, P-6 d, and P-8 d correspond to different pupal stage. F: feeding stage; M: molting stage; MM: metamorphic molting stage; P: pupal stage.

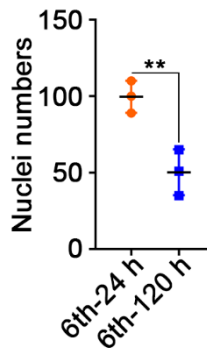


Figure S5. The number of nuclei in IGF-2-like-positive fat body cells stained by DAPI in the fat body at 6th-24 h and 6th-120 h.

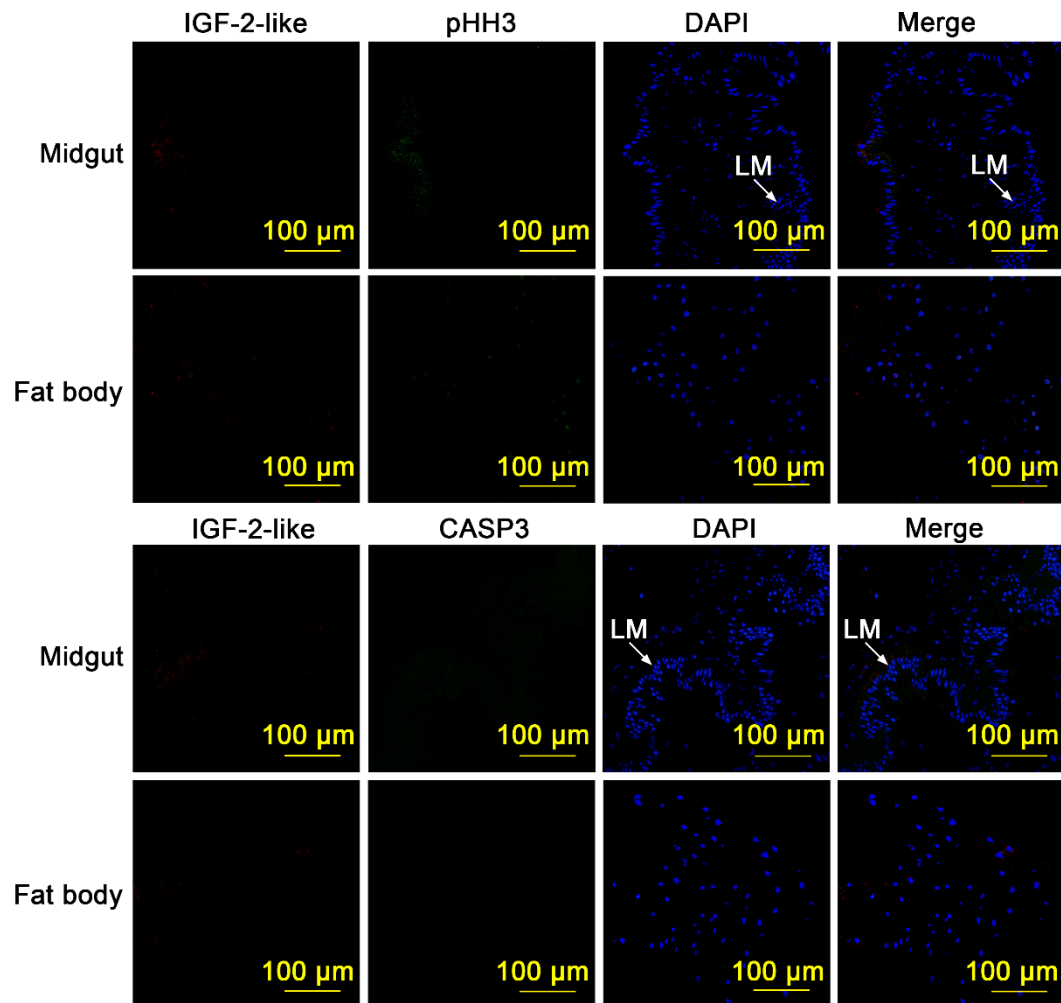


Figure S6. IGF-2-like, pHH3, and CASP3 were not detected in the midgut and fat body at the 6th-24 h by immunofluorescence. The scale bar is 100 μ m.

Table S1 Primers used in the experiments

Exp-Igf-2-like-F tactcagatatcatgtagtaacaaggca

Exp-Igf-2-like-R tactcagagctctgcgtagacgacgtacgc

Igf-2-like-RTF ctgccacgcttacaacagtcc

Igf-2-like-RTRtcagcaataaccgtttccact

Igf-2-like-RNAiF gcgtaatacgactcactataggacgacaagtgggaaacgg

Igf-2-like-RNAiR gcgtaatacgactcactataggaggtcagtggtgagtggtccg

Igf-2-like-swRNAiF tactcactgcagacgacaagtgggaaacgg

Igf-2-like-swRNAiR tactcactcgagaggtcagtggtgagtggtccg

GFP-RNAiF gcgtaatacgactcactataggatgggtcccaattctcgtggaac

GFP-RNAiR gcgtaatacgactcactatagggacttgaagttgaccttgatgcc

GFP-swRNAiF tactcagcgccgctgggcccaattctcgtggaac

GFP-swRNAiR tactcactcgagcttgaagttgaccttgatgcc

G-1-like-RTF gttgacggaaatgaaagg

G-1-like-RTR cagacggtaaatacctaatac

c-Myc-RTF atgaagactggaggataatgga

c-Myc-RTR tgttggtgggtgtagtggttg

Wnt-RTF gtcacggtatgtcaggctcg

Wnt-RTRggctccaggtcagtattaggc

β -actin-RTF cctggtattgctgaccgtatgc

β -actin-RTR ctgttggaaggtggagaggga