

APPENDIX 1. Mammalian faunal lists of East Asia formatted for AEO analysis (Alroy, 1992, 1994, 1996, 1998, 2000). The references are indicated in each list. See CONJUNCT version 1.5 manual from Dr. John Alroy's homepage (<http://www.nceas.ucsb.edu/~alroy/biochronology.html>) for the explanation of data format of AEO analysis.

Paleogene faunas (92 faunas):

Pondaung_fauna

[Tsubamoto (2001) Tsubamoto et al. (2002, 2003, in press) Pondaung Fm Myanmar]

Bahinia pondaungensis

Amphipithecus mogaungensis

Pondaungia cotteri

Myanmarpithecus yarshensis

Hyaenodontidae indet. [gen. nov.]

Pterodon dahkoensis ["*Pterodon*" *dahkoensis*]

Anomaluridae indet. [gen. nov.]

Hsanotherium parvum

Dichobunidae indet. [gen. nov.]

cf. Dichobunidae indet. [gen. nov.]

Anthracotherium pangan

Anthracotherium rubricum

Anthracotherium birmanicus

Anthracotherium tenuis

Pakkokuhys lahirii

Indomeryx cotteri

Indomeryx arenae

cf. *Indomeryx cotteri*

Sivatitanops cotteri

Sivatitanops birmanicum

Metatelmatherium ? lahirii

Bunobrontops savagei

cf. *Ilianodon lunanensis*

Paramynodon birmanicus

Amyndontidae indet. [F]

Indolophus guptai

Deperetella birmanica

Ceratomorpha indet. [G]

? *Eosimias* sp.

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Krabi_fauna

[Ducrocq et al. (1995, 1996, 1997, 1998) Chaimanee et al. (1997) Ducrocq (1997, 1999) Peigné et al. (2000) Marivaux et al. (2000) Métais et al. (2001) Tsubamoto et al. (2002) southern Thailand]

Dermotherium major
Insectivora indet.
Pteropodidae indet.
Wailekia orientale
Wailekia sp.
Siamopithecus eocaenus
Miacis thailandicus
? Mustelidae indet.
? Procyonidae indet.
Nimravus cf. *intermedius*
Hoplophoneus sp.
Caniformia indet.
Baluchimys krabiense
Ctenodactyloidea indet. [2]
Egatochoerus jaegeri
Siamochoerus banmarkensis
Entelodontidae indet.
Siamotherium krabiense
Anthracotherium chaimanei
Anthracotherium thailandicus
Bothriogenys orientalis
Bothriogenys cf. *orientalis*
Atopotherium bangmarkensis
Anthracotheriinae indet. [gen. et sp. nov.]
Progenitohyus thailandicus
Krabimeryx primitivus
Archaeotragulus krabiensis
Helaletidae indet. [gen. et sp. nov.]
? Hyracodontidae indet. [gen. et sp. nov.]
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Dongjun_fauna

[Russell and Zhai (1987), Li and Ting (1983) Tsubamoto et al. (2000) Dongjun Fm
Bose Basin southern China]

level: Sec1 1

Eudinoceras crassum
? *Eusmilus* sp.
Andrewsarchus crassum
? *Probrachyodus* sp. [sp. nov.]
Metatelmatherium sp.
cf. *Protitan* sp.
Deperetella birmanica
Teleolophus sp.
Forstercooperia sp.
? *Ilianodon* sp.
Prohyracodon sp.
cf. *Gigantamynodon* sp.

Amynodon sp.
cf. *Paramynodon* sp.

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Naduo_fauna

[Russell and Zhai (1987), Li and Ting (1983), Ducrocq (1999), Guo et al. (1999) Liu (2001) and Tsubamoto et al. (2002) Naduo Fm Bose and Yongle Basin, southern China]
level: Sec1 2

Eodesmatodon spanios

Cephalogale sp. [sp. nov.]

cf. *Cephalogale* sp.

Guangxicynodon sinocaliforniae

? *Pachycynodon* sp. [sp. nov.]

? *Propterodon* sp.

Guilestes acares

Guilestes cf. *acares*

cf. *Harpagolestes* sp.

Entelodontidae indet.

Tayassuidae indet. [gen. nov.]

Siamochoerus viriosus

Huaxiachoerus guangxiensis

? Choeropotamidae indet. [gen. nov. (?Helohyidae)]

Anthracotherium rubricum

Anthracotherium birmanicus

Anthracotherium sp.

Anthracotheriidae indet. [*Bothriodon* *chyelingensis*]

Heothema bellia

Notomeryx besensis

Notomeryx major

Indomeryx cotteri

Gobiomeryx sp.

Tragulidae indet.

Metatelmatherium cf. *lahirii* [*Metatelmatherium* ? cf. *lahirii*]

Deperetella sp.

Eomoropus cf. *quadridentatus*

Huananodon hui

Guixia simplex

Caenolophus sp.

Paramynodon sp.

.

Gongkang_fauna

[Russell and Zhai (1987), Li and Ting (1983), Tong and Zhao (1986), Qi and Beard (1998), Ducrocq (1999), Liu (2001) and Tsubamoto et al. (2002) Gongkang Fm Bose and Yongle Basin, southern China]

level: Sec1 3

Guangxilemur tongi
Machairodontinae indet. [gen. nov.]
? *Hoplophoneus* sp.
Eopecarihyus sp. [sp. nov.]
Anthracotherium kwangsiensis
Anthracotherium sp.
Anthracotheriidae indet. ["*Bothriodon*" *tientongensis*]
Heothema bellia
Heothema chengbiensis
Schizotherium nabanensis
Schizotherium sp.
Huananodon hypsodonta
Guixia youjiangensis
Forstercooperia sp. [sp. nov.]
Odoichoerus uniconus
Eocenchoerus savagei
cf. *Indomeryx* sp.

Lower Lumeiyi fauna

[Russell and Zhai (1987), Li and Ting (1983) lower part of Lumeiyi Fm Lunan Basin, southern China]

level: Sec2 1

Creodonta indet.
Nimravidae indet.
Tillodontia indet.
Honanodon sp.
Gobiohyus sp.
Anthracotheriidae indet.
Brontotheriidae indet.
Protitan cf. *robustus*
Rhinotitan sp.
Breviodon lumeiyiensis
Lophialetes expeditus
Lophialetes cf. *expeditus*
Lophialetes yunnanensis
Rhodopagus pygmaeus
Rhodopagus minimus
Deperetella sp.
Teleolophus sp.
Helaletes mongoliensis
Hyrachyus lunanensis
Hyrachyus minor
Lunania youngi
Forstercooperia sp.
Prohyracodon sp.

Teilhardia pretiosa
? *Teilhardia* sp.
Caenolophus medius
Caenolophus sp.
Lushiamynodon menchiapuensis
Amynodon lunanensis
Amynodon sp. [spp.]

Upper_Lumeiyi_fauna

[Russell and Zhai (1987), Li and Ting (1983) and Ducrocq (1999) upper part of Lumeiyi Fm Lunan Basin, southern China]

level: Sec2 2

Pterodon dahkoensis
Chailicyon crassidens
? Canidae [?Miacidae] indet.
Eoentelodon yunnanense
Anthracotheriidae indet.
Probrachyodus panchiaoensis
Brontotheriidae indet.
Rhinotitan quadridens
Rhinotitan sp.
Dianotitan lunanensis
Breviodon sahoensis
Deperetella dienensis
Deperetella birmanica
Teleolophus medius
Teleolophus cf. *magnus*
? *Teleolophus rectus*
? *Litolophus ulterior*
Eomoropus cf. *quadridentatus*
Forstercooperia shiwopuensis
Forstercooperia sp.
Juxia sp.
Indricotherium parvum
Indricotherium cf. *parvum*
? *Indricotherium* sp.
Rhinocerotidae indet.
Prohyracodon progressa
Prohyracodon meridionale
Prohyracodon cf. *orientale*
Ilianodon lunanensis
Amynodon altidens
Amynodon sp.
cf. *Metamynodon* sp.
cf. *Paramynodon* sp.

Xiaotun_fauna

[Russell and Zhai (1987) Xiaotun Fm Lunan basin Henan south China]

level: Sec2 3

Hyracodontidae indet.

cf. *Gigantamynodon giganteus*

Bothriogenys hui

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Xiangshan_fauna

[Russell and Zhai (1987), Li and Ting (1983) and Huang (1999) Xiangshan Fm Lijiang Basin, southern China]

Creodonta indet.

? *Pterodon* sp.

Honanodon hebetis

Honanodon sp.

Lohoodon lushiensis

Eoentelodon likiangensis

Anthracokeryx sinensis

Anthracothema lijiangensis

? Leptomerycidae indet.

Brontotheriidae indet. [Metatelmatheriinae indet.]

? *Lophialetes* sp.

Breviodon lumeiyiensis

Schlosseria sp.

Rhodopagus yunnanensis

Lijiangia zhang

? *Lophiodon* sp. [spp.]

Deperetella birmanica

Teleolophus xiangshanensis

Lunania youngi

Eomoropus minimus

Grangeria canina

Prohyracodon major

Prohyracodon meridionale

Amynodon sp.

Caenolophus sp.

.

Caijiachong_fauna

[Russell and Zhai (1987), Li and Ting (1983) McKenna and Bell (1997) Wang (2001a) Caijiachong Fm Yuezhong Basin, southern China]

Dormaliidae indet.

Erinaceoidea indet.

Vespertilionoidea indet.

? Primates indet.

Lagomorpha indet.

Eucricetodon sp.
Karakoromys sp.
Dianomys obscuratus
Dianomys qujingensis
Youngomys yunnanensis
Youngomys pisinnus
? *Youngomys* sp.
Plesiosminthus sp.
Entelodon sp.
Bothriodon chowi
cf. *Indomeryx* sp.
Miomeryx sp.
Lophiomeryx sp.
Artiodactyla indet.
Brontotheriidae indet.
Rhinocerotidae indet.
Prohyracodon sp.
Gigantamynodon giganteus
Gigantamynodon cf. *giganteus*
Gigantamynodon sp.
Cadurcodon ardynensis
Cadurcodon sp.
Caenopinae indet. [*Caenolophus* sp.]
cf. *Metamynodon* sp.
Indricotherium intermedium
Indricotherium qujingensis
Indricotherium sp.

Limuping_(Lingcha)_fauna
[Russell and Zhai (1987) and Ting (1993) Limuping (Lingcha) Fm Hengyang Basin
Hengdong County Hunan southern China]
? Palaeoryctidae indet. [gen. et sp. nov.]
Hsiangolestes youngi
Matutinia nitidulus
Hapalodectes hetangensis
Archaeolambda sp.
Asiocoryphodon sp.
Chapattimyidae indet.
Cocomys lingchaensis
Propachynolophus hengyangensis
Orientolophus hengdongensis
Hunanictis inexpectatus

Xinyu_fauna
[Russell and Zhai (1987) Xinyu Fm Yuanshui Basin Jiangxi southern China]

"*Coryphodon*" *ninchiashanensis*
Coryphodon sp.
Prodinoceras sinyuensis
Miacis tenuis
? *Heptodon* sp.

Hetaoyuan fauna

[Tong (1997) Dashzeveg and Hooker (1997) Hetaoyuan Fm Henan middle China]

Chungchienia sichuanica
Iconapterodus qii
Neoryctes qinlingensis
Didymoconidae indet.
Jiajianictis muricatus
Ardynictis zhaii
? Archaeonycterididae indet.
Eodendrogale parvum
Strenulagus shipigouensis
? *Lushilagus danjiangensis*
Lushilagus lohoensis
Shamolagus sp.
Dituberolagus venustus
? Ischyromyidae indet.
Orientocylindrodon liguanqiaoensis
cf. *Pareumys* sp.
cf. *Mysops* sp. [spp.]
Tamquammys dispinorum
Viriosomys jingweni
Tsinlingomys youngi
Chuankueimys xichuanensis
Saykanomys cf. *bohlini*
Stelmomys parvus
Boromys obtusus
Boromys brachyblastus
Zoyphiomys sinensis
Zoyphiomys grandis
Hydentomys crybelophus
Hydentomys major
Raricricetodon ? *trapezius*
Palasiomys conulus
Primismithus yuenus
Miacis lushiensis
? *Sarkastodon henanensis*
? *Sinopa* sp.
Prolaena parva
Propterodon sp.
Propterodon ? *shipigouensis*

? *Andrewsarchus* sp.
Sianodon sp.
Lophialetes expeditus
Schlosseria hetaoyuanensis
Breviodon minutus
Breviodon cf. *minutus*
Rhodopagus minimus
? *Protitan* sp.
Deperetella sichuanensis
Teleolophus danjiangensis
Teleolophus xui
Prohyracodon sp.

Guanzhuang_fauna

[Russell and Zhai (1987), Li and Ting (1983), Wang (1988) and Dashzeveg and Hooker (1997) Guanzhuang Fm Shandong middle China]

Coryphodontidae indet.
? *Coryphodon flerowi*
Eudinoceras xintaiensis
Kuanchuanius shantunensis
Uintheriidae indet.
Rodentia indet.
? *Thinocyon sichowensis*
Haplomylus ? sp.
Heptaconodon dubium
Palaeosyops sp.
Propalaeotherium sinense
Propalaeotherium sp.
Grangeria canina
Irdinolophus shandongensis [*Teleolophus?* *shandongensis*]
Teleolophus sp.
Hyrachyus modestus ?
Hyrachyus metalophus
Hyrachyus sp.
Helaletes sp.
Lophialetes sp.
Schlosseria sp.
Yimengia sp. [sp. 2]
Yimengia zdanskyi
Yimengia laiwuensis
Yimengia yani

Lower_Lushi_fauna

[Russell and Zhai (1987), Li and Ting (1983) and Chow et al. (1996) lower part of Lushi Fm Henan middle China]

level: Sec3 1

Eudinoceras sp.

Chungchienia lushia

Dinocerata indet.

Uintatherium sp.

Mesonychidae indet.

Gobiohyus sp.

Breviodon sp.

Lophialetes sp.

.

Upper_Lushi_fauna

[Russell and Zhai (1987), Li and Ting (1983), and Tsubamoto et al. (2002) upper part of Lushi Fm Henan middle China]

level: Sec3 2

Esthonychidae indet. [Trogosinae indet.]

Lushius qinlinensis

Eudinoceras sp.

Lushilagus lohoensis

Tsinlingomys youngi

Miacis lushiensis

Cynodictis sp.

cf. *Eusmilus* sp.

Hyaenodon sp.

Propterodon morrisoni

Andrewsarchus henanensis

Andrewsarchus mongoliensis

Honanodon hebetis

Honanodon macrodontus

Lohoodon lushiensis

Dichobune sp.

Mammalia indet. [? *Anthracotherium* ? spp.]

Gobiohyus orientalis

Gobiohyus robustus

Sianodon honanensis

Lushiamynodon menchiapuensis

Caenolophus sp.

Breviodon minutus

Rhodopagus minimus

Protitan grangeri

? *Microtitan* sp.

Deperetella sp.

Prohyracodon sp.

Forstercooperia sp. [spp.]

Colodon sp.

Lunania youngi

Eomoropus sp.

Baishuicun_fauna

[Russell and Zhai, 1987 Baishuicun Formation Yuanqu basin Shanxi middle China]

level: Sec4 3

Bothriogenys hui

Zhaili_fauna

[Russell and Zhai (1987), Li and Ting (1983), Qi and Zhou (1989) Tong (1997), Beard (1998) and Huang et al. (1998) Tong et al. (1999) Guo et al. (2000) Tsubamoto et al. (2002) Zhaili Mbr upper part of Heti Fm Henan middle China]

level: Sec4 2

Ictopidium lechei

Yuanqulestes qiui

cf. *Iconapterodus* sp. [II]

Lapichiropteryx xiei

Lapichiropteryx sp.

? *Icaronycteris* sp.

Hoanghoniuss stehlini

Xanthorhysis tabrumi

Eosimias centennicus

Pappocricetodon schaubi

Primisminthus jinus

Banyuesminthus diconjugatus

Protataromys yuanquensis

Chapattimyidae indet.

Anadianomys cf. *declivis*

Chailicyon crassidens

Hyaenodon yuanchuensis

Anthracokeryx sinensis

Anthracokeryx cf. *sinensis*

Zhailimeryx jingweni

Rhinotitan mongoliensis

Sharamynodon mongoliensis ?

Sianodon sinensis

Amynodon sp.

Juxia borissiaki

Rencun_fauna

[Russell and Zhai (1987), Li and Ting (1983), Tong (1997) and Tsubamoto et al. (2000b, 2002) Rencun Mbr lower part of Heti Fm Henan middle China]

level: Sec4 1

Ictopidium cf. *lechei*

cf. *Apternodus* sp.

cf. *Iconapterodus* sp. [I]

Microchiroptera indet.
? *Strenulagus* sp.
Shamolagus cf. *medius*
Gobiolagus sp.
? *Hulgana* *eoertnia*
? *Hulgana* sp.
Pappocricetodon rencunensis
Raricricetodon minor
Raricricetodon zhongtiaensis
Primisminthus shanghenus
Primisminthus cf. *jinus*
Banyuesminthus uniconjugatus
cf. *Sinosminthus* sp.
Protataromys mianchiensis
Yuomys cavioides
Anadianomys declivis
Xueshimys dissectus
Zodiomys longmensis
Hoanghoniuss stehlini
Rencunius wui
Rencunius zhoui
Adapidae indet.
Eosimias cf. *centennicus*
Trogosinae indet.
Adapidium huanghoensis
Pterodon cf. *dahkoensis*
Honanodon hebetis
? *Dichobune* sp.
Anthracokeryx sinensis
Anthracosenex ambiguus
? *Indohyus yuanchuensis*
Eomoropus quadridentatus
Litolophus major
? Isectolophidae indet.
Deperetella depereti
Deperetella birmanica
? *Rhodopagus* sp.
Prohyracodon cf. *meridionale*
Sharamynodon mongoliensis
Sianodon sinensis
Sianodon mienchiensis
? *Amynodon* sp.
Caenolophus cf. *promissus*

Huangzhuang_fauna

[Shi (1989), Wang (1994), Wang and Wang (1997), Tsubamoto et al. (2000b), and

Tsubamoto (2001) Huangzhuang Fm Qufu Shandong middle China]

Yuomys huangzhuangensis

Mammalia indet. ["cf. *Pterodon dahkoensis*"]

cf. *Propterodon* sp.

Eudinoceras sishuiensis

Anthracokeryx sinensis

Qufutitan zhoui

Eomoropus minimus

Eomoropus quadridentatus

Breviodon minutus

Deperetella birmanica

Deperetella sp.

Caenolophus suprametalophus

Caenolophus magnus

Caenolophus proficiens

Caenolophus minimus

Caenolophus sp.

Hyracodontidae indet.

Fostercoopera sp.

.

Yuhuangding_fauna

[Russell and Zhai (1987) Yuhuangding Fm Xichuan Basin Henan middle China]

Asiocoryphodon conicus

Asiocoryphodon lophodontus

Coryphodontidae indet. [<<*Coryphodon*>> *flerowi*]

Dinocerata indet.

Advenimus hupeiensis

Rhombomylus sp.

cf. *Heptodon* sp.

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Shanghuang_fauna

[Qi et al. (1991, 1996), Beard et al. (1994) and Qi and Beard (1996), Jiangsu, middle China]

Didelphidae indet.

Ardynictis sp.

Erinaceidae indet.

Lagomorpha indet.

Lushilagus lohoensis

Miacis lushiensis

Miacis gracilis

Vulpavus sp.

Procynodictis sp.

Hyaenodontidae indet.

Limnocyon sp.

Pterodon sp.

Hyaenodon sp.
Adapoides troglodytes
Macrotarsius macrorhysis
Tarsius eocaenus
Eosimias sinensis
Pappocricetodon antiquus
Pappocricetodon rencunensis
Pappocricetodon schaubi
Eucricetodon sp.
Ischyromyidae indet.
Ischyromyidae indet. [gen. et sp. nov.]
Chapattimyidae indet.
Ctenodactylidae indet.
Rodentia indet. [fam., gen. et sp. nov.]
Microchiroptera indet. [1]
Microchiroptera indet. [2]
Tillodontia indet. [1]
Tillodontia indet. [2]
Hyopsodontidae indet.
Homacodontidae indet. [gen. et sp. nov.]
? *Eoentelodon* sp.
Anthracotheriidae indet.
? Leptomerycidae indet. [gen. et sp. nov.]
Eomoropus sp.
Nanotitan shanghuangensis
Microtitan cf. *mongoliensis*
Heptodon sp.
Helaletes mongoliensis
Helaletes sp.
Hyrachyus sp.
Rhodopagus sp.
Forstercooperia sp.
Caenolophus sp.
Palaeotheriidae indet. [gen. et sp. nov.]
.

Wutu_fauna

[Russell and Zhai (1987) and Tong and Wang (1998) Wutu Fm Wutu Basin Shandong middle China]

Mesodmops dawsonae
Auroratherium sinense
? Palaeoryctidae indet.
Changlelestidae indet. [gen. et sp. nov.]
Changlelestes dissetiformis
Erinaceidae indet. [gen. et sp. nov.]
? Nyctitheriidae indet. [gen. et sp. nov.]
Pseudictopidae indet. [gen. et sp. nov.]

Chronolestes simul
Carpocristes oriens
cf. *Ignacius* sp. [sp. nov.]
? *Micromomyidae* indet. [gen. et sp. nov.]
Rodentia indet.
Bandaomys zhonghuaensis
Alagomys oriensis
Acritoparamys ? wutui
Taishanomys changlensis
? *Oxyaena* sp. [sp. nov.]
cf. *Protictis* sp. [sp. nov.]
Esthonychidae indet. [gen. et sp. nov.]
Dissacus sp.
Hapalodectes sp. [sp. nov.]
Hyopsodontidae indet. [gen. et sp. nov.]
Lophocion asiaticus
Pastoralodon sp. [sp. nov.]
Arctostylopidae indet. [gen. et sp. nov.]
Isectolophidae indet. [gen. et sp. nov.]
Homogalax wutuensis
Ampholophus luensis
Eomoropidae indet. [gen. et sp. nov.]
? *Entelodontidae* indet. [gen. et sp. nov.]
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Nomogen_fauna

[Meng and McKenna (1998) Nomogen Fm Nei Mongol north China]
level: Sec7 1

Pseudictops lophiodon
Palaeostylops iturus
Gashatostylops macrodon
Dissacus serratus
Pastoralodon haliutensis
Pastoralodon convexus
Pastoralodon lacustris
Eomylus borealis
Sphenopsalis sp.
Prionessus lucifer
Sphenopsalis nobilis
Lambdopsalis bulla
Rodentia indet.
Sarcodon pygmaeus
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Gashato_Mbr_III_fauna

[Russell and Zhai (1987) and Meng et al. (1998) Mbr III Khashat Fm Mongolia]
level: Sec9 3

Gomphos elkema

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Gashato_Mbr_II_fauna

[Russell and Zhai (1987) and Meng et al. (1998) Mbr II Khashat Fm Mongolia]

level: Sec9 2

Gomphos elkema

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Gashato_Mbr_I_fauna

[Meng and McKenna (1998) Mbr I Khashat Fm Mongolia]

level: Sec9 1

Pseudictops lophiodon

Gashatostylops macrodon

Palaeostylops iturus

Dissacus sp.

Prodinoceras martyr

Praolestes nanus

Eurymylus laticeps

Prionessus lucifer

Sphenopsalis nobilis

Khashanagale ? sp.

Khashanagale zofiae

Sarcodon pygmaeus

Hyracolestes ermineus

Phenacolophus fallax

.

Aguyt_fauna

[Meng et al. (1998) Aguyt Mbr Naran-Bulak Fm Mongolia]

level: Sec8 4

Gomphos sp.

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Bumban_(Tsagan_Khushu)_fauna

[Meng and McKenna (1998) Bumban Mbr Naran-Bulak Fm (Tsagan Khushu) Mongolia]

level: Sec8 3

Artiodactyla indet.

Hapalodectes sp.

Tsaganius ambiguus

Naranius infrequens

Pantolestidae indet.

Hyopsodus orientalis

Hyaenodontidae indet.

Lipotyphla indet.

Gomphos elkema
Rhombomylus turpanensis
Zagmys insolitus
? *Orientolophus namadicus*
? *Orientolophus gabuniai*
Altanius orlovi
Kharomys gracilis
Tribosphenomys sp. [n. sp.]
Sharomys parvus
Kharomys mirandus
Alagomys inopinatus
Sharomys singularis
Tsagamys subitus
Ulanomys mirificus
cf. *Hyracolestes* sp.
Oedolius perexiguus
Bumbanius rarus
Nyctitheriidae indet.

Naran_fauna
[Meng and McKenna (1998) Naran Mbr Naran-Bulak Fm Mongolia]
level: Sec8 2

Pseudictops lophiodon
Gashatostylops macrodon
Palaeostylops iturus
Dissacus indigenus
Pachyaena nemegetica
Archaeolambda planicanina
Coryphodon tsaganensis
Ernanodon sp.
Oxyaena sp.
cf. *Sinopa* sp.
Prodinoceras martyr
Eurymylus laticeps
Eomylus zhigdenensis
Amar aleator
Prionessus lucifer
Prionessus sp.

Zhigden_fauna
[Russell and Zhai (1987) Zhigden Mbr Mongolia]
level: Sec8 1
Prionessus lucifer
cf. *Prionessus lucifer*
Sarcodon sp.

cf. *Praolestes nanus*
Archaeolambda planicanina
Prodinoceras martyr
Pseudictops lophiodon
Eurymylus laticeps
cf. *Eurymylus* sp.
Eurymylidae indet.
Dissacus indigenus
Ernanodon sp.
Palaeostylops iturus
Gashatostylops macrodon
Didymoconidae indet.

.

Bayan_Ulan_fauna
[Meng and McKenna (1998) Bayan Ulan Fm Nei Mongol north China]
level: Sec7 2
? ? Palaeoryctoidea indet.
Pseudictops lophiodon
Palaeostylops iturus
Gashatostylops macrodon
cf. *Viverravus* sp.
Dissacus serratus
Pachyaena sp.
Pastoralodon lacustris
Prolimnocyon chowi
Prodinoceras xinjiangensis
Leptictidae indet. [n. gen. and sp.]
? *Khaichina elongata*
Eomylus borealis
Prionessus lucifer
Prionessus cf. *lucifer*
Lambdopsalis bulla
Perissodactyla indet.
Tribosphenomys minutus
Hyracolestes ermineus
Sarcodon minor
Bayanulanius tenuis
? *Sarcodon pygmaeus*

.

Arshanto_fauna
[Meng and McKenna (1998) and Dashzeveg and Hooker (1997) Arshanto Fm Nei
Mongol north China]
level: Sec7 3
? *Hapalodectes serus*
Mongolonyx dolichognathus

Mesonyx cf. *obtusidens*
Metacoryphodon ? *minor*
Metacoryphodon sp.
Metacoryphodon luminis
Pantolambdodon fortis
? *Pantolambdodon minor*
Gobiatherium mirificum
? *Gobiatherium major*
? *Gobiatherium monolobotum*
cf. *Untatherium* sp.
Archaeoryctes borealis
Hyrachyus crista
? *Forstercooperia grandis*
Hyrachyus neimongoliensis
Forstercooperia huhebulakensis
cf. *Hyrachyus eximius*
Forstercooperia sp.
Homogalax reliquius
Schlosseria cf. *magister*
Schlosseria magister
Lophialetes expeditus
Breviodon minutus
Forstercooperia confluens
Hyrachyus sp.
Helaletes medius
Protitan minor
Metatelmatherium cristatum
? *Microtitan elongatus*
Microtitan sp.
Desmatotitan sp.
Teilhardia pretiosa
Teleolophus cf. *medius*
? *Irdinolophus* ? *primarius* [*Teleolophus* ? *primarius*]
Helaletes fissus ?
Heptodon minimus
Helaletes fissus
Teleolophus ? *rectus*
Asiomys dawsoni
Tamquammys wilsoni
Paramys sp.
Advenimus burkei
Sinosinopa sinensis

Irдин_Manha_fauna_at_Irдин_Manha

[Meng and McKenna (1998) Lavrov (1996) Lucas et al. (1997) Irдин Manha Fm Nei Mongol north China]

level: Sec7 4
cf. *Archaeomeryx* sp.
Gobiohyus pressidens
Gobiohyus robustus
Gobiohyus orientalis
Miacis invictus
Mesonychidae indet.
Hapalodectes serus
Andrewsarchus mongoliensis
Pachyaena sp.
Mesonyx sp.
? *Pantolestes* sp.
Pantolestidae indet.
Eudinoceras mongoliensis
Mongoleryctes acutus
Sarkastodon mongoliensis
Neoparapterodon rechetovi
Triplopus proficiens [? *Triplopus proficiens*]
Breviodon minutus
Rhodopagus pygmaeus
Forstercooperia totadentata
Schlosseria sujiensis
Lophialetes sp.
Lophialetes expeditus
Metatelmatherium parvum
Microtitan mongoliensis
Gnathotitan berkeyi
Epimanteoceras robustus
Protitan grangeri
Litolophus gobiensis
Teleolophus medius
Irdinolophus mongoliensis
Protitan obliquidens
Ischyromyidae indet.

Irдин_Mанһа_fauna_at_Camps_Margetts
[Li and Ting (1983) and Russell and Zhai (1987) Irдин Manһа Fm Nei Mongol north
China]

level: Sec7 4
Pantodonta indet.
Gobiatherium mirificum
Paramyidae indet.
Advenimus burkei
Mongolonyx dolichognathus
Andrewsarchus mongoliensis

Metatelmatherium cristatum
Protitan minor
Protitan ? cingulatus
Litolophus gobiensis
cf. *Teleolophus medius*
Helaletes fissus
Helaletes fissus ?
Helaletes sp.
cf. *Hyrachyus sp.*
Lophialetes expeditus
? Breviodon sp.
cf. *Schlosseria magister*
Rostriamynodon grangeri
Forstercooperia grandis
.

Ulan_Shireh_fauna

[Meng and McKenna (1998) Lucas et al. (1997) Nei Mongol north China]

Gobiohyus orientalis
Miacidae indet.
? Harpagolestes serus
cf. *Mesonyx sp.*
Mesonychidae indet.
? Harpagolestes orientalis
Eudinoceras mongoliensis
Pantolambdodon fortis
Pantolambdodon inermis
Propterodon cf. morrisoni
Sarkastodon mongoliensis
Palaeolaginae indet.
Shamolagus grangeri
Kennatherium shirensis
Schlosseria ulanshirensis
Lophialetes sp.
Lushiamynodon sharamurenensis
Epimanteoceras formosus
Zhongjianoletes chowi
Acrotitan ulanshirensis
Zhongjianoletes sp.
Breviodon minutus
? Lophialetes expeditus
? Breviodon sp.
Microtitan mongoliensis
Dolichorhinoides angustidens
Desmatotitan tukhumensis
Teleolophus medius
Protitan bellus

Rhodopagus pygmaeus
Forstercooperia cf. *grandis*
Forstercooperia sp.
Triplopus proficiens [? *Triplopus proficiens*]
Advenimus bohlini
cf. *Advenimus* sp.
Yuomys weijingensis

Shara_Murun_fauna
[Meng and McKenna (1998) Tsubamoto et al. (2002) Shara Murun Fm Nei Mongol
north China]

Archaeomeryx optatus
Ulausuodon parvus
Artiodactyla indet. [cf. *Anthracoeryx* sp.]
Propterodon cf. *morrisi*
Pterodon hyaenoides
Desmatolagus sp.
Shamolagus medius
Gobiolagus tolmachovi
Lushiamynodon sharamurenensis
Lophialetes sp.
Caenolophus obliquus
Rhodopagus minimus
Triplopus progressus [? *Triplopus progressus*]
Sianodon sp.
Sianodon ulausuensis
Juxia borissiaki
Sharamynodon mongoliensis
cf. *Cadurcodon* sp.
Caenolophus promissus
Titanodectes ingens
Rhinotitan andrewsi
Pachytitan ajax
Gigantamynodon promissus
Rhinotitan kaiseni
Rhinotitan mongoliensis
Deperetella cristata
Schizotherium sp.
Titanodectes minor
Teleolophus medius ?
? *Telmatherium* sp. [(= *Manteoceras*)]
Yuomys cavioides

Khaychin_(II,_III,_V)_fauna
[Meng and McKenna (1998) Lavrov (1996) Mongolia]

"Hypertragulidae" indet.
Gobiohyus sp. [n. sp.]
Mongolonyx robustus
Metahapalodectes makhchinus
cf. *Eudinoceras* sp.
Neoparapterodon rechetovi
Erinaceomorpha indet.
Lagomorpha indet.
Breviodon minutus
Amyodontidae indet.
Triplopus proficiens [? *Triplopus proficiens*]
Lophialetes expeditus
Forstercooperia totadentata
Protitan reshetovi
Protitan khaitshinus
Teleolophus sp.
Deperetella khaitchinulensis
Microtitan mongoliensis
Teleolophus medius
Euboromys grandis
Petrokozlovia notos
Saykanomys bohlini
Apternodontidae indet.

Kholboldzhi-Nur_fauna
[Meng and McKenna (1998) Mongolia]
Hapalodectidae indet.
Pantolambdodon bodgensis
Archaeolambda prima
Eudinoceras kholobochoiensis
Bodgia orientalis
cf. *Hypercoryphodon* sp.
Lagomorpha indet.
Isectolophidae indet.
Hyracodontidae indet.
Perissodactyla indet.
Pataecops parvus
Brontotheriidae indet.
Teilhardia sp.
Breviodon sp.
Lophialetes expeditus ?
Schlosseria magister
Gobihippus menneri
Rhodopagus sp.
Irdinolophus tuiensis [*Irdinolophus* ? *tuiensis*]

Ergilin_Member_fauna_at_Ergilin_Dzo

[Lucas and Emry (1996) Meng and McKenna (1998) Vislobokova (1998) Mongolia]

level: Sec5 2

Bothriodon sp.
Praetragulus gobiae
Miomeryx altaicus
Entelodon gobiensis
Stenoplesictis simplex
Nimravus mongoliensis
Hyaenodon sp.
Pterodon mongoliensis
Forstercooperia sp.
Forstercooperia ergiliensis
Ardynia mongoliensis
Ronzotherium brevirostris
Ronzotherium orientale
Cadurcodon ardynensis
Cadurcotherium progressus
Embolotherium ergiliense
Ardynia praecox
Gigantamynodon cessator
Embolotherium andrewsi
Armania asiana
Schizotherium avitum
Colodon inceptus
Ardynomys silentii
Ardynomys olseni
Ardynomys chihi

.

Ergilin_Member_fauna_at_Khoer_Dzan

[Meng and McKenna (1998) Lucas and Emry (1996) Vislobokova (1998) Mongolia]

level: Sec5 2

Bothriodon sp.
Entelodon gobiensis
Praetragulus electus
Nimravus mongoliensis
Hyaenodon incertus
Gigantamynodon cessator
Embolotherium sp.
Schizotherium avitum
Eomoropus sp.
Teleolophus magnus
Indricotherium sp.
Ronzotherium orientale

.

Sevkhul_Member_fauna_at_Khoer_Dzan

[Meng and McKenna (1998) Mongolia]

level: Sec5 1

Eoentelodon trofimovi

Mongolestes hadrodens

Metahapalodectes sp.

Pterodon sp.

Hyaenodon incertus

Pterodon exploratus

Hyaenodon eminus

Desmatolagus vetustus

Ardynictis furunculus

Prohyracodon meridionalis

Amynodon lunanensis

Gigantamynodon cessator

Ardynia mongoliensis

Ardynia praecox

Embolotherium grangeri

Armania asiana

Teleolophus magnus

Deperetella cf. *birmanica*

Schizotherium avitum

Colodon inceptus

Ardynomys sp.

.

Urtyn_(Erden)_Obo_fauna

[Meng and McKenna (1998) Urtyn Obo Fm Nei Mongol north China]

Entelodon sp.

Mesonychidae indet.

? *Gobiolagus major*

Cadurcodon ardynensis

Amynodontopsis parvidens

Cadurcodon sp.

Amynodon alxaensis

Schizotherium cf. *avitum*

Ardynia praecox

Urtinotherium incisivum

Parabrontops gobiensis

.

Ulan_Gochu_fauna

[Meng and McKenna (1998) and Lucas et al. (1996) Ulan Gochu Fm Nei Mongol north China]

level: Sec7 5

Anagale gobiensis

Mongolestes hadrodens
Gobiolagus andrewsi
Desmatolagus vetustus
Didymoconidae indet.
Metatitan primus
Embolotherium grangeri
Embolotherium loucksii
Amyodontidae indet.
Metatitan progressus
Embolotherium andrewsi
Amyodontopsis sp.
Cadurcodon sp.
Zaisanamynodon borisovi
Ischyromyidae indet.
Hulgana ertinia
Ardynomys sp.

.

Chaganbulage_fauna
[Wang and Wang (1997) Meng and McKenna (1998) Chaganbulage Fm Nei Mongol
north China]

Embolotherium grangeri
Brontotheriidae indet.
Amynodon alxaensis
Cadurcodon suhaituensis
Sianodon sp.
Rhinocerotidae indet.
Teleolophus magnus
Teleolophus cf. *medius*
Lophiomeryx cf. *gracilis*
Cervidae indet.
Harpagolestes alxaensis
Gobiolagus cf. *andrewsi*
Gobiomys neimongolensis
Insectivora indet.

.

Hsanda_Gol_fauna_at_Tsagan-Obo
[Meng and McKenna (1998) Mongolia]

Eumeryx sp.
Eumeryx culminus
Palaeogale cf. *ulysses*
cf. *Palaeoscaptor acridens*
Sinolagomys tatalgolicus
Tachyoryctoides tatalgolicus
Tachyoryctoides obrutschewi
Tsaganomys altaicus

Yindirtemys deflexus
Cricetops dormitor
Selenomys mimicus

Hsanda_Gol_fauna_at_Shunkht
[Meng and McKenna (1998) Mongolia]
Palaeogale parvula
Stenogale sp. [n. sp.]
Palaeoprionodon gracilis
Amphicynodon teilhardi
Stenoplesictis elegans [see Dashzeveg 1996]
Hyaenodon sp.
Hyaenodon chunkhtensis
Palaeoscaptor acridens
Amphechinus rectus
Sinolagomys argyropuloi
Didymoconus colgatei
Indricotherium sp.
Tsaganomys altaicus
Selenomys mimicus
Karakoromys sp.
Cricetops dormitor

Ulaan_Khongil_(Tatal_Mbr)_fauna
[Meng and McKenna (1998) Storch and Dashzeveg (1997) Mongolia]
level: Sec5 4
"Entelodon" sp.
Eumeryx culminus
Miomeryx cf. *altaicus*
Pseudomeryx hypertalonidus
Pseudomeryx gobiensis
cf. *Plesictis* sp. [A]
cf. *Plesictis* sp. [B]
Amphicynodon teilhardi
Nimravus sp.
Palaeoprionodon gracilis
cf. *Proailurus* sp.
Palaeogale ulysses
Palaeogale parvulus
Mustelidae indet. [new taxon]
Stenoplesictis elegans
Hyaenodon aymardi
Hyaenodon compressus
Tupaiodon morrisi
Amphechinus rectus

Exallerix hsandagolensis
Exallerix sp.
Zaraalestes russelli
Palaeoscaptor acridens
Talpidae indet.
Proscalopidae indet.
Procaprolagus vetustus
Procaprolagus maximus
Ordolagus teilhardi
Desmatolagus simplex [= *Agispelagus*]
Desmatolagus robustus
Sinolagomys argyropuloi
Sinolagomys tatalgolicus
Desmatolagus gobiensis
Didymoconus colgatei
Didymoconus berkeyi
Ongghonia dashzevegi
Eggysodon minor
Indricotherium transouralicum
Forstercooperia sp.
Eucricetodon asiaticus [= *Leidymys* ? ?]
Selenomys mimicus
Cricetops aeneus
Cricetops dormitor
Muridae indet [new taxon]
Tsaganomys altaicus
Karakoromys decessus
Anomomys lohiculus
Tataromys minor
Tataromys plicidens
Pseudocylindrodon mongolicus
Ardynomys sp.
Haplomys arboraptus
Tataromys sigmodon
Plesiosminthus tangingoli
Gobisorex kingae

.
Ulaan_Khongil_(Shand_Mbr)_fauna
[Meng and McKenna (1998) Mongolia]
level: Sec5 5
Archaeomerycinae indet. [new taxon]
Eumeryx imbellis
Miomeryx cf. *altaicus*
Pseudomeryx hypertalonidus
Pseudomeryx gobiensis
Palaeoprionodon gracilis

cf. *Proailurus* sp.
Palaeogale ulysses
Palaeogale parvulus
Amphicticeps sp. [new sp.]
Amphicticeps shackelfordi
Stenoplesictis elegans
Hyaenodon aymardi
Hyaenodon compressus
? *Palaeoscaptor* sp. [new sp.]
Talpidae indet.
Ordolagus teilhardi
Desmatolagus robustus
Sinolagomys argyropuloi
Sinolagomys tatalgolicus
Desmatolagus gobiensis
Didymoconus colgatei
Didymoconus berkeyi
Eggysodon minor
Indricotherium transouralicum
Forstercooperia sp.
Eucricetodon asiaticus [= *Leidymys* ? ?]
Cricetops dormitor
Cricetops elephantus
Tsaganomys altaicus
Anomomys lohiculus
Pseudocylindrodon mongolicus
Ardynomys sp.
Haplomys arboraptus
Castoridae indet. [new taxon]
Tataromys sigmodon
Plesiosminthus tangingoli
? *Tachyoryctoides obrutschewi*

Zavlia_(Shand_Mbr)_fauna
[Meng and McKenna (1998) Mongolia]
level: Sec5 5
Palaeohypsodontus asiaticus
Eumeryx imbellis
Miomeryx cf. *altaicus*
Pseudomeryx hypertalonidus
Pseudomeryx gobiensis
cf. *Proailurus* sp.
Mustelidae indet. [new taxon]
Hyaenodon aymardi
Hyaenodon compressus
Exallerix sp.

Metexallerix gaolanshanensis
Talpidae indet.
Desmatolagus robustus
? *Desmatolagus gobiensis*
Didymoconus colgatei
Didymoconus berkeyi
Didymoconus sp.
Eggysodon minor
Indricotherium transouralicum
Rhinocerotidae indet. [undescribed taxon]
? *Cricetops dormitor*
Tachyoryctoides obrutschewi
Tsaganomys altaicus
? *Yindirtemys deflexus*
? *Yindirtemys suni*
? *Plesiosminthus tangingoli*
.

Tsakhir_fauna
[Meng and McKenna (1998) Mongolia]
Entelodon sp.
Pseudomeryx gobiensis
Miomeryx sp.
Desmatolagus gobiensis
Amphechinus rectus
Karakoromys decessus
Cricetops dormitor
Selenomys mimicus
Tsaganomys sp.
Tsaganomys altaicus
.

Khatan-Khayrkhan_fauna
[Meng and McKenna (1998) Mongolia]
Amphicticeps shackelfordi
Amphicynodon teilhardi
Tupaiodon minutus
Didymoconus berkeyi
Eucricetodon asiaticus
Cricetops dormitor
Tsaganomys altaicus
Selenomys mimicus
Tataromys minor
Karakoromys decessus
Tataromys plicidens
Yindirtemys gobiensis
Anomomys lohiculus

Kekeamu_fauna

[Meng and McKenna (1998) Nei Mongol north China]

level: Sec17 1

Tupaiodon sp.

Desmatolagus sp.

Ardynia cf. *mongoliensis*

Schizotherium turgaieum

Eucricetodon sp.

Plesiosminthus sp. [= *Heosminthus*]

Prosciurus sp.

Karakoromys decessus

Ardynomys sp.

Ulantatal_fauna

[Meng and McKenna (1998) Nei Mongol north China]

level: Sec17 2

Hanhaicerus qii

Palaeohypsodontus cf. *asiaticus*

Eumeryx culminus

Palaeogale ulysses

Cynodictis ? sp.

Palaeogale parvulus

Hyaenodon ? sp.

Amphechinus rectus

Amphechinus cf. *rectus*

Palaeoscaptor acridens

Desmatolagus pusillus

Sinolagomys kansuensis

Desmatolagus cf. *gobiensis*

Ordolagus teilhardi

Sinolagomys major

Didymoconus colgatei

Aceratherium sp.

Cadurcodon sp.

Selenomys mimicus

Boumymys bohlini

Plesiosminthus tangingoli

Plesiosminthus asiaecentralis

Plesiosminthus parvulus

Plesiosminthus qiui

Plesiosminthus tongi

Euryodontomys exiguus

Cricetidae indet.

Tsaganomys cf. *altaicus*

Tsaganomys altaicus
Tataromys plicidens
Tataromys minor
Karakoromys decessus
Tataromys sigmodon
Boumymys ulantatalensis
Ardynomys sp.
Euryodontomys ampliatus
.

Wulanbulage_(lower)_fauna
[Meng and McKenna (1998) Vislobokova (1998) Nei Mongol north China]
level: Sec6 1
Cervidae indet.
Eumeryx sp.
Tragulidae indet.
Lophiomeryx sp.
Praetragulus gobiae
Miacidae indet.
Carnivora indet.
Hyaenodon ? sp.
Desmatolagus gobiensis
Leporidae indet.
Hyracodontidae indet.
Cadurcodon ardynensis
Karakoromys decessus
Plesiosminthus tangingoli
Tsaganomys sp.
Tsaganomys altaicus
.

Wulanbulage_(upper)_fauna
[Meng and McKenna (1998) Nei Mongol north China]
level: Sec6 2
Lophiomeryx sp.
Palaeohypsodontus asiaticus
Eumeryx sp.
Amphicyon sp.
Carnivora indet.
Hyaenodon sp.
Erinaceomorpha indet.
Leporidae indet.
Desmatolagus gobiensis
Schizotherium sp.
Paraceratherium sp.
Aprotodon sp. [sp. n.]
Tsaganomys sp.

Tataromys sigmodon
Tataromys parvus
Tataromys minor
Tsaganomys altaicus
Cricetops dormitor
Plesiosminthus asiaecentralis
Plesiosminthus sp.
Eomys orientalis
Eomyodon sp.
Karakoromys decessus

Yikebulage_fauna
[Meng and McKenna (1998) Nei Mongol north China]
level: Sec6 3
Desmatolagus sp.
Sinolagomys gracilis
Sinolagomys kansuensis
Sinolagomys major
Sinolagomys sp.
Amphechinus cf. *rectus*
Amphechinus minimus
Amphechinus sp.
Distylomys qianlishanensis
Tataromys parvus
Yindirtemys ambiguus
Yindirtemys deflexus
Yindirtemys grangeri
Yindirtemys sp.
Yindirtemys suni
Plesiosminthus parvulus
Plesiosminthus tangingoli
Tachyoryctoides kokonorensis
Tachyoryctoides obrutschewi
Tsaganomys sp.
Castoridae indet.

Saint-Jacques_fauna
[Meng and McKenna (1998) Nei Mongol north China]
Eumeryx cf. *culminus*
Cervidae indet.
Amphicyon ? sp.
Hyaenodon sp.
Amphechinus rectus
Desmatolagus pusillus
Sinolagomys cf. *major*

Ordolagus teilhardi
Desmatolagus gobiensis
Desmatolagus robustus
Hyrachyus sp.
Aceratherium ? sp.
Schizotherium cf. *avitum*
Paraceratherium sp.
Indricotherium transouralicum
Gomphotherium ? sp.
? *Pseudotheridomys* sp.
Pseudotheridomys asiaticus
Anomoemys lohicolus
Cricetops dormitor
Eomys orientalis
Cricetops minor
Tsaganomys altaicus
Selenomys mimicus
Eucricetodon caducus
Euryodontomys ampliatus
Boumymys bohlini
Karakoromys sp.
Karakoromys decessus
Promeniscomys sinensis
Prosciurus ordosicus
Tataromys minor
Tataromys plicidens
Boumymys ulantatalensis
Yindirtemys deflexus
Yindirtemys ambiguus
Tataromys sigmodon
Haplomys arboraptus

Lower_Taben_Bulak_(Yindirte)_fauna
[Meng and McKenna (1998) Gansu north China]
level: Sec10 3
Eumeryx sp.
Carnivora indet.
Amphechinus rectus
Talpidae ? indet.
Amphechinus minimus
Erinaceidae ? indet.
Amphechinus cf. *rectus*
Sinolagomys major
Sinolagomys kansuensis
Didymoconus ? sp.
Aceratherium sp.

Schizotherium ? sp.
Rhinocerotidae indet.
? *Kansupithecus* sp.
"Sciurus" sp.
Tachyoryctoides sp.
Sicistinae indet.
Yindirtemys grangeri
Yindirtemys cf. *ambiguus*
Eucricetodon sp.
Plesiosminthus asiaecentralis
Yindirtemys ambiguus
Plesiosminthus tangingoli
Plesiosminthus parvulus
Soricidae indet.

Upper_Shargaltein_(Shihchiantzuku)_fauna
[Meng and McKenna (1998) Gansu north China]

level: Sec10 2
Cervulinae indet.
Eumeryx ? sp.
Bovidae indet.
Carnivora indet.
Amphechinus sp.
Erinaceidae indet.
Palaeoscaptor cf. *acridens*
Desmatolagus robustus
Sinolagomys gracilis
Desmatolagus pusillus
Sinolagomys major
Sinolagomys kansuensis
Didymoconus sp.
Indricotherium sp.
Sciuridae indet.
Sicistinae indet.
Tataromys sigmodon
Yindirtemys ambiguus
Tataromys parvus
Tachyoryctoides intermedius
Tachyoryctoides obrutschewi
Tachyoryctoides pachygnathus
Tsaganomys altaicus

Lower_Shargaltein_(Wutaoyayu)_fauna
[Russell and Zhai (1987) Gansu north China]
level: Sec10 1

Eumeryx ? sp.
Indricotherium sp.
Desmatolagus sp.
cf. *Tataromys* sp.
cf. *Karakoromys* sp.
Tsaganomys altaicus
Carnivora indet.

.

Houldjin_fauna
[Meng and McKenna (1998) and Lucas and Emry (1996) Lucas et al. (1996) Wang (2001b) Houldjin Fm Nei Mongol north China]

Entelodon dirus
Entelodon gobiensis
Caenopinae indet.
Rhinocerotidae indet.
Brontotheriidae indet.
Aprotodon sp. [n. sp.]
Paraceratherium sp. [n. sp.]
Cadurcodon sp.
Ctenodactyloidea indet. [gen. & sp. n.]
Zaisanamynodon borisovi
Yuomys sp.
Protataromys sp.
Advenimus cf. *bohlini*
Advenimus cf. *burkei*
? *Gobiomys* sp.
Gobiomys cf. *exiguus*
Gobiomys neimongolensis

.

Baron_Sog_fauna
[Russell and Zhai (1987) Lucas et al. (1996) Lucas and Emry (1996) Baron Sog Fm Nei Mongol north China]

Embolotherium ultimum
Schizotherium avitum
Schizotherium sp.
Zaisanamynodon borisovi
Entelodon gobiensis

.

Khaychin-Ula_I_fauna
[Russell and Zhai (1987) Naran-Bulak Fm Mongolia]

Archaeolambda planicanina
Pastoralodon trofimovi
Barylamba sp.
Prodinoceras sp.

Prodinoceras martyr
Mixodontia indet.

.

Datang_fauna

[Wang et al. (1998) and Russell and Zhai (1987) Datang Mbr Nongshan Fm Nanxiong basin, Guangdong, south China]

level: Sec12 3

cf. *Huaiyangale leura*

Haltictops mirabilis

Haltictops meilingensis

Interogale datangensis

Yantanglestes datangensis

Altilambda pactus

Altilambda sp.

Nanlingilambda sp.

"*Altilambda*" *minor* [new family]

Ernanodon antelios

Petroleumur brevirostre

Minchenella grandis

Yuelophus validus

Radinskya yupingae

.

Zhunguikeng_fauna

[Wang et al. (1998) and Russell and Zhai (1987) Zhunguikeng Mbr Nongshan Fm Nanxiong basin, Guangdong, south China]

level: Sec12 2

Archaeolambda speciosa

.

Shanghu_fauna

[Wang et al. (1998) and Huang and Zheng (1999) Shanghu Fm Nanxiong basin, Guangdong, south China]

level: Sec12 1

Carnilestes palaeoasiaticus

Carnilestes major

Linnania lofoensis

Astigale nanxiongensis

Zhujegale lirenensis

Zhujegale jintangensis

Lofochaius brachyodus

Dysnoetodon minuta

Yantanglestes feiganensis

Dissacusium shanghoensis

Hukoutherium ambigum

Yuodon protoselenoides

Palasiodon siurenensis
? *Ectoconus* sp.
? Phenacodontidae indet. [gen. et sp. nov.]
Bemalambda nanhsiungensis
Bemalambda pachyoesteus
Bemalambda crassa
Pappictidops acies
Pappictidops obtusus
Huananius youngi

.

Pinghu_fauna
[Wang et al. (1998) Pinghu Fm Chijiang basin, Jiangxi, south China]
level: Sec13 4
Prodinoceras lacustris

.

Wangwu_fauna
[Wang et al. (1998) and Russell and Zhai (1987) Wangwu Mbr Chijiang Fm Chijiang basin, Jiangxi, south China]
level: Sec13 3
Jiangxia chaotoensis
Archaeolambda tabiensis
Allostylops periconotus
Bothriostylops notios
Bothriostylops sp.

.

Lannikeng_fauna
[Wang et al. (1998) and Russell and Zhai (1987) Lannikeng Mbr Chijiang Fm Chijiang basin, Jiangxi, south China]
level: Sec13 2
Archaeoryctes notialis
Hsiuannania minor
cf. *Pseudictops tenuis*
? *Dissacus* sp.
Hyopsodontidae indet.
Pseudanisonchus antelios
Nanlingilambda chijiangensis
Harpyodus decorus
Asiostylops spanios
Ganolophus lannikenensis

.

Shizikou_fauna
[Wang et al. (1998) Shizikou Fm Chijiang basin, Jiangxi, south China]
level: Sec13 1

Bemalambda shizikouensis
Bemalambda sp.

.

Zaoshi_fauna

[Wang et al. (1998) Zaoshi Fm Chaling basin, Hunan, south China]

Stenanagale xiangensis
Dissacus rotundus
Meiostylodon zaoshiensis
Bemalambda nanhsiungensis
Hypsilolambda chalingensis
Hypsilolambda impensa

.

Upper_Doumu_fauna

[Wang et al. (1998) and Russell and Zhai (1987) Upper Mbr Doumu Fm Qianshan basin, Anhui, middle China]

level: Sec11 5

Hyracolestes ermineus
Hsiuannania sp.
Heomys orientalis
Mimotona wana
Altilambda sp. [sp. nov.]
Archaeolambda tabiensis
Sinostylops promissus

.

Lower_Doumu_fauna

[Wang et al. (1998) and Russell and Zhai (1987) Lower Mbr Doumu Fm Qianshan basin, Anhui, middle China]

level: Sec11 4

Hsiuannania tabiensis
Allictrops inserrata
Mimotona robusta
Obtusodon hanhuaensis

.

Upper_Wanghudun_fauna

[Wang et al. (1998) and Russell and Zhai (1987) Upper Mbr Wanghudun Fm Qianshan basin, Anhui, middle China]

level: Sec11 3

Zeuctherium niteles
Eosigale gujingensis
Huaiyangale chianshanensis
Qipania yui
Diacronus wanghuensis
Anictops tabiepedis

Paranictops majuscula
? *Paranictops* sp.
Mimotona lii
Pappictidops orientalis
Harpyodus euros
Altilambda pactus
Altilambda yujingensis
Altilambda tenuis
Decoredon anhuiensis
Obtusodon hanhuaensis
Wania chowi

.

Lower_Wanghudun_fauna

[Wang et al. (1998) and Russell and Zhai (1987) Lower Mbr Wanghudun Fm Qianshan basin, Anhui, middle China]

level: Sec11 1

Anaptogale wanghoensis
Anictops tabiepedis
Cartictops canina
Astigale wanensis
Chianshaniania gianghuaiensis
Wanogale hodungensis
Yantanglestes conexus
Bemalambda sp.
Bemalambdidae indet.
Plethorodon chienshanensis
Anchilestes impolitus

.

Shuangtasi_fauna_at_Xuancheng

[Wang et al. (1998) Shuangtasi Fm Xuancheng basin, Anhui, middle China]

Hsiuannania maguensis
Dissacus magushanensis
Bothriostylops progressus
Archaeolambda yangtzeensis
Wanotherium xuanchengensis

.

Shuangtasi_fauna_at_Tongling

[Wang et al. (1998) Shuangtasi Fm Tongling basin, Anhui, middle China]

Bothriostylops progressus
Archaeolambda cf. *yangtzeensis*
Guichilambda zhaii

.

Fangou_fauna

[Wang et al. (1998) Fangou Fm Shimen basin, Shaanxi, middle China]

Prosarcodon luonanensis

Linnania qinlingensis

Bemalambda zhoui

Bemalambda cf. pachyoesteus

Hukoutherium shimenensis

.

Liankan_fauna

[Russell and Zhai (1987) Liankan Fm Turfan basin, Xinjiang, northwest China]

level: Sec15 2

? *Rhinotitan* sp.

Teleolophus liankanensis

Lophialetes expeditus

Lophialetidae indet. [3 spp.]

Sharamynodon mongoliensis

Amynodon sp.

Xinjiangmeryx parvus

? Anthracotheriidae indet. [? *Bothriodon* sp.]

.

Taizicun_fauna

[Wang et al. (1998) Taizicun Fm Turfan basin, Xinjiang, northwest China]

level: Sec15 1

Multituberculata indet.

Eurymylidae indet.

Pseudictops chaii

Archaeolambda speciosa

Archaeolambda sp. [2]

Prodinoceras turfanensis

Prodinoceras diconicus

Prodinoceras primigenum

Prodinoceras simplum

Tienshanilophus subashiensis

Tienshanilophus lianmuqinensis

Tienshanilophus shengjinkouensis

.

Shisanjianfang_fauna

[Russell and Zhai (1987) Shisanjianfang Fm Turpan basin Xinjiang northwest China]

level: Sec14 2

Coryphodon sp.

Rhombomylus turpanensis

Hyopsodus sp.

Heptodon tienshanensis

Anatolostylops dubius

.

Dabu_fauna

[Russell and Zhai (1987) and Wang et al. (1998) Dabu Fm Turpan basin Xinjiang northwest China]

level: Sec14 1

Coryphodon dabuensis

Prodinoceras xinjiangensis

.

Lizhuang_fauna

[Russell and Zhai (1987) Lizhuang Fm Pingchangguan basin Henan middle China]

Yuomys minggangensis

Carnivora indet.

Breviodon cf. *minutus*

Triplopus cf. *proficiens* [*Triplopus* ? cf. *proficiens*]

Hyracodontidae indet.

Anthracokeryx sp.

Anthracotheriidae indet.

Gobiohyus orientalis

Gobiohyus ? *minor*

Artiodactyla indet.

.

Wulidui_fauna

[Russell and Zhai (1987) Wulidui Fm Wucheng basin Henan middle China]

level: Sec16 2

Imequincisoria mazhuangensis

Imequincisoria micracis

? *Imequincisoria* sp.

Juxia borissiaki

Sianodon sinensis

Gigantamynodon sp.

cf. *Lushiamynodon* sp.

.

Lishigou_fauna

[Russell and Zhai (1987) Lishigou Fm Wucheng basin Henan middle China]

level: Sec16 1

Yuomys elegans

Carnivora indet.

Hyaenodon sp.

Hyaenodontidae indet.

Eomoropus sp.

Deperetella sp.

Breviodon sp.

Lophialetidae indet. [gen. et sp. nov.]

Pappaceras sp.

Lushiamynodon wuchengensis
Sharamynodon mongoliensis
Sianodon sinensis
Sianodon sp.

.

Jiyuan_fauna
[Russell and Zhai (1987) Jiyuan Fm Henan middle China]
Yuomys cavioides
Lushiamynodon obesus
Sianodon chiyuanensis
Sianodon sinensis

.

Chugouyu_fauna
[Russell and Zhai (1987) Chugouyu Fm Lushi basin Henan middle China]
level: Sec3 3
Palaeolaginae indet.
Yuomys sp. [sp. nov.]
Ctenodactylidae indet.
Litolophus major
Breviodon sp. [sp. nov.]
Forstercooperia sp.
Archaeomeryx optatus

.

Shuidonggou_fauna
[Russell and Zhai (1987) Lingwu District Ningxia north China]
Tsaganomys sp.
Indricotherium transouralicum
Hyracodontidae indet.
Eumeryx sp.

.

Qingshuiying_fauna
[Russell and Zhai (1987) Lucas and Emry (1996) Qingshuiying Fm Lingwu District
Ningxia north China]
Cyclomytus lohensis
Schizotherium sp.
Indricotherium transouralicum
Entelodon gobiensis
"Eumeryx" sp.

.

Jeminay_fauna
[Jin (2000) Jeminay Xinjiang northwest China]
Triplopus sp.

Triplopus ? jeminaiensis
Lophialetes sp.
Hyaenodontidae indet.

.

Akasaki_fauna
[Miyata and Tomida (1998) Akasaki Fm Japan]
Higotherium hypsodon
cf. *Trogosus* sp. [A]
cf. *Trogosus* sp. [B]
Coryphodontidae indet.
Asiocoryphodon cf. *conicus*
cf. *Orientalophus hengdongensis*
Rodentia indet.

.

Neogene faunas (33 faunas):

Lanzhou_fauna
[Qiu and Qiu (1995) Yehucheng Fm middle China]
Metexallerix gaolanshanensis
Tataromys grangeri
Tataromys suni
Tataromys sp.
Leptotataromys cf. *gracilidens*
Tsagannomys altaicus

.

Upper_Taben_Buluk_(Tiehchiangku_and_Hsishui)_fauna
[Russell and Zhai (1987) Gansu north China]
level: Sec10 4
Sayimys obliquidens
Bunolophodon ? connexus ["*Trilophodon*"]
Schizotherium sp.
Proboscidea indet.
Cervulinae indet.
Bovidae indet.
Rhinocerotidae indet. [small]
Rhinocerotidae indet. [large]
? *Kansupithecus* sp.

.

Suosuoquan_fauna
[Qiu and Qiu (1995) McKenna and Bell (1997) Suosuoquan Fm Xinjiang northwest

China]

Prodistylomys xinjiangensis

Sinolagomys ulungurensis

Palaeoerinaceus sp.

Tachyoryctoides sp.

Plesiosminthus sp. [= *Parasminthus* sp.]

Palaeogale sp.

Exallerix sp. [nov.]

.

Xiejia_fauna

[Qiu and Qiu (1995) middle China]

Atlantoxerus sp.

Eucricetodon youngi

Plesiosminthus xiningensis

Plesiosminthus huangshuiensis

Plesiosminthus lajeensis

Tataromys suni

Tataromys sp.

Tachyoryctoides kokonorensis

Leporidae indet.

Sinolagomys pachygnathus

Sinolagomys cf. *pachygnathus*

Mustelidae indet.

? *Diaceratherium* sp.

Sinopalaeoceros xiejiaensis

.

Zhangjiaping_fauna

[Qiu and Qiu (1995) Xianshuihe Fm middle China]

Tataromys sp.

Sinolagomys sp.

Tachyoryctoides sp.

Hyaenodon sp.

Schizotherium sp.

Aprotodon sp.

Indricotheriidae indet.

? Proboscidea indet.

.

Jiaozigou_fauna

[Qiu and Qiu (1995) middle China]

Dzungariotherium orgosense

Paraentelodon macrognathus

Rhinocerotidae indet.

Proboscidea indet.

.

Wuertu_fauna
[Qiu and Qiu (1995) north China]
Amphechinus minimus
Amphechinus sp.
Sinolagomys cf. *ulungurensis*
Sinolagomys sp.
Distylomys qianlishanensis
Prodistylomys xinjiangensis
Tachyoryctoides sp.
Megacricetodon sp.
Protalactaga sp.
Gomphotherium sp.

Sihong_(Xiacaowan)_fauna
[Qiu and Qiu (1995) middle China]
Lanthanotherium sp.
Crocidosorex sp.
Myotis sp.
Vespertilionidae indet.
Ansomys orientalis
Parapetaurista tenurugosa
Shuanggouia lui
Eutamias sihongensis
Plesiosciurus sinensis
Sciurinae indet.
Youngofiber sinensis
Microdyromys orientalis
Sayimys sp.
Rhizomyidae indet.
Diatomys cf. *shantungensis*
cf. *Cricetodon* sp.
Megacricetodon sp.
Democricetodon sp.
Primus sp.
Neocometes sp.
Cricetidae indet.
Alloptox sp.
? *Amphicyon* sp.
Ursidae indet.
Proputorius sp.
Semigenetta huaiheensis
Pseudaelurus cf. *lorteti*
Mustela sp.
? *Protictitherium* sp.

Rulengchia huaiheensis
? *Anchiterium* sp.
Plesiaceratherium shanwangensis
Suidae indet.
Pecarichoerus sp.
Dorcatherium orientale
Micromeryx sp.
Dicrocerus sp.
Amphimoschus sp.
Stephanocemas sp.
Lagomeryx sp.
Palaeomeryx sp.
Delphinus sp.
Dionysopithecus shuangouensis
Platodontopithecus jianghuaiensis
Hominoidea indet.

Shanwang_fauna
[Qiu and Qiu (1995) middle China]
Shanwangia unexpectula
Ansomys shanwangensis
Plesiosciurus aff. *sinensis*
Meinia asiatica
Diatomys shantungensis
Amphicyon confucianus
Hemicyon youngi
Ursavus orientalis
Thaumastocyoninae indet.
Gomphotherium sp.
Palaeotapirus xiejiaheensis
Chalicotherium sp.
Plesiaceratherium gracile
Plesiaceratherium shanwangensis
Diaceratherium sp.
Hyotherium penisulus
Palaeomeryx tricornis
Lagomeryx colberti

Dingjiaergou_fauna
[Qiu and Qiu (1995) middle China]
Erinaceidae indet.
Talpidae indet.
Soricidae indet.
Chiroptera indet.
Sayimys sp.

Tachyoryctoides sp.
Atlantoxerus sp.
Steneofiber sp.
? *Leptodontomys* sp.
Prodryomys sp.
Heterosminthus orientalis
Protalactaga grabau
Paralactaga sp.
Megacricetodon sp.
Democricetodon sp.
Alloptox gobiensis
Tongxinictis primordialis
Gobicyon sp.
Hemicyon sp.
Sansanosmilus sp.
Platybelodon tongxinensis
Caementodon tongxinensis
Chalicotherium sp.
Kubanochoerus lantienensis
Stephanocemas sp.
Eotragus sp.
Turcoceros sp.
Pliopithecus zhanxiangi

Koujiacun_fauna
[Qiu and Qiu (1995) Koujiacun Fm middle China]
Kubanochoerus lantienensis
Kubanochoerus gigas
Bunolistriodon intermedius
Platybelodon grangeri
Lagomeryx complicidens
Antelopinae indet.

Jiulongkou_fauna
[Qiu and Qiu (1995) and Chen and Wu (1976) Cixian middle China]
Macrotherium cf. *brevirostris*
Percrocuta hebeiensis
Sansanosmilus palmidens
Dicerorhinus cixianensis
Dicerorhinus sp.
Plesiaceratherium gracile
Chilotherium sp.
Palaeomeryx sp.
Turcocerus jiulongkouensis
Turcocerus robustus

Turcocerus stenocephalus
Aceratheriinae indet.
Rhinocerotidae indet.
? *Dicrocerus* sp.
? *Stephanocemas* sp.
Cervidae indet.

Lengshuigou_fauna
[Qiu and Qiu (1995) and McKenna and Bell (1997) middle China]
Alloptox minor
Tsaganolagus wangi
Gomphotherium shensiensis
Platybelodon spectabilis
Hispanotherium lingtungensis
Listriodon lishanensis
Palaeotragus sp.
Stephanocemas sp.
Palaeomeryx sp.
? *Micromeryx* sp.
Turcocerus lishanensis

Tunggur_fauna
[Qiu and Qiu (1995) north China]
Mioechinus ? *gobiensis*
Mioechinus ? sp.
Erinaceinae indet.
Proscapanus sp.
Yanshuella sp.
Quyania sp.
Desmanella sp.
Talpidae indet.
Mongolosorex qiui
Soricinae indet.
Soricidae indet.
Chiroptera indet.
Anomys ? sp.
Eutamias aff. *ertemtensis*
Sinotamias primitivus
Atlantoxerus sp.
Anchitheriomys tungurensis
Monosaulax tungurensis
Hystricops ? sp.
Leptodontomys lii
Leptodontomys aff. *gansus*
Keramidomys fahlbuschi

Microdyromys wuae
Miodyromys sp.
Heterosminthus orientalis
Protalactaga grabau
Protalactaga major
Gobicricetodon flynni
Gobicricetodon robustus
Gobicricetodon sp.
Plesiodipus leei
Plesiodipus progressus
Megacricetodon sinensis
Megacricetodon pusillus
Democricetodon lindsayi
Democricetodon tongi
? *Desmatolagus moergenensis*
Alloptox gobiensis
Bellatona forsythmajori
Gobicyon macrognathus
Pseudarctos sp.
Hemicyon teilhardi
Amphicyon tairumensis
Leptarctus neimonguensis
Melodon sp.
Mionictis sp.
Martes sp.
Tungurictis spocki
Percrocuta tungurensis
Metailurus mongoliensis
Machairodus sp.
Platybelodon grangeri
Serridentinus gobiensis
Zygalophodon sp.
Anchitherium gobiensis
Chalicotherium brevirostre
Chalicotheriidae indet.
Rhinocerotidae indet. [spp.]
Listriodon mongoliensis
Kubanochoerus sp.
Stephanocemas thomsoni
Dicerocerus grangeri
Dicerocerus sp.
Micromeryx sp.
Lagomeryx triacuminatus
Euprox sp.
Palaeotragus tungurensis
Turcocerus grangeri
Turcocerus noverca

Shaping_fauna

[Qiu and Qiu (1995) Shaping Fm Fangxian north China]

Tesselodon fangxianensis

Anchitherium aurelianense

Turcocerus noverca

Listriodon robustus

Karamagay_fauna

[Qiu and Qiu (1995) Karamagay Fm Xinjiang northwest China]

Sinomylagaulus halamagaiensis

Atlantoxerus junggarensis

Atlantoxerus giganteus

Amblycastor tunggurensis

Gomphotherium cf. *shensiense*

Platybelodon sp.

Zygalophodon junggarensis

Amphicyon ulungurensis

Ictitherium cf. *gaudryi*

Anchitherium cf. *aurelianense*

Brachypotherium sp.

Chilotherium sp.

Kubanochoerus sp.

Stephanocemas aff. *thomsoni*

Dicrocerus grangeri

Lagomeryx sp.

Palaeomeryx sp.

Eotragus halamagaiensis

Turcocerus noverca

Gobicyon sp.

Miohyaena sp.

Xianshuihe_fauna

[Qiu and Qiu (1995) Yongdeng Gansu middle China]

Protalactaga grabau

Heterosmithus orientalis

Plesiodipus leei

Paracricetulus schaubi

Kubanochoerus gigas

Gomphotherium sp.

Lingyanshan_fauna

[Qiu and Qiu (1995) middle China]

Tetralophodon sp.
Acerorhinus sp.
Hyotherium cf. *palaeochoerus*

.

Xiaolongtan_fauna
[Qiu and Qiu (1995) and Dong (1987) south China]
Dryopithecus keiyuanensis
Tapirus cf. *yunnanensis*
Propotamochoerus parvulus
Dicoryphochoerus sp.
Listriodon sp.
Tetralophodon xiaolongtanensis
Gomphotherium cf. *macrognathus*
Zygodontomys chinjiensis
Mustelidae indet.
Cervidae indet.
Castoridae indet.

.

Tsaidam_fauna
[Qiu and Qiu (1995) middle China]
? *Ictitherium* sp.
? *Tetralophodon* sp.
Acerorhinus tsaidamensis
Hipparion sp.
? *Stephanocemas* sp.
Lagomeryx tsaidamensis
? *Dicrocerus* sp.
Eostylocerus sp.
Qurlignoria cheni
Tossunnonia pseudibex
Tsaidamotherium hedinii
Olonbulukia sp.

.

Lufeng_fauna
[Qiu and Qiu (1995) south China]
Prodendrogale yunnanica
Lanthanotherium sanmigueli
Hylomys aff. *suillus*
Heterosorex wangi
Anourosorex oblongus
Blarinella sp.
Sorex sp.
Soricinae indet.

Yunosaptor scalprum
Talpinae indet.
Pteropidae indet.
Hipposideridae indet.
Myotis sp.
Eptesicus sp.
Pipistrellus sp.
Plecotus sp.
Tamiops sp.
Sciurotamias sp.
Callosciurus sp.
Dremomys sp.
cf. *Albanensia* sp.
Hylopetes sp.
Castoridae indet.
Platacanthomys dianensis
Typhlomys primitivus
Typhlomys hipparionum
Leptodontomys sp.
Eomyidae indet.
Brachyrhizomys nagrii
Brachyrhizomys cf. *pilgrimi*
Brachyrhizomys tetracharax
Kowalskia hanae
Progonomys yunnanensis
Yunomys wui
Hystrix sp.
Alilepus longisinuosus
Ursavus sylvestris
Ursavus sp.
Indarctos sinensis
Indarctos sp.
Ailurarctos lufengensis
Martes cf. *palaeosinensis*
Martes sp.
Mustelinae indet.
Eomellivora wimani
Melinae indet.
Proputorius lufengensis
Proputorius sp.
Sivaonyx bathygnathus
Lutra sp.
Lutrinae indet.
Mustelidae indet.
Viverra sp.
Viverrinae indet.
Paradoxurinae indet.

Viverridae indet.
Ictitherium gaudryi
Ictitherium sp.
Epimachairodus fires
Pseudaelurus sp.
Felis sp.
Gomphotherium sp.
Serridentinus sp.
Zygodon lufengensis
Hipparion sp. [spp.]
Chalicotherium salinum
Chalicotherium sp.
Tapirus sp.
Chilotherium sp.
Aceratherium sp.
Hyotherium sp.
Hyotherium cf. *palaeochoerus*
Lophochoerus lufengensis
Potamochoerus sp. [spp.]
Suidae indet.
Dorcabone progressus
Yunnanotherium simplex
Moschus sp.
Dicrocerus sp.
Metacervulus cf. *simplex*
Metacervulus sp. [spp.]
Muntiacus cf. *nanus*
Muntiacus sp. [spp.]
Cervidae indet.
Selenoportax sp.
Bovidae indet.
Sinoadapis carnosus
Sinoadapis shihuibaensis
Laccopithecus robustus
Lufengpithecus lufengensis
.

Baode_fauna_(Loc._30)
[Qiu and Qiu (1995) north China]
Sinocastor zdanskyi
Simocyon aff. *primigenius*
Indarctos lagrelii
Indarctos sinensis
Sinictis dollicognathus
Mustela palaeosinensis
Proputorius minimus
Plesiogulo brachygnathus

Lutra aonychooides
Parataxidea sinensis
Parataxidea crassa
Melodon majori
? *Melodon incertum*
Promephitis cf. *maeotica*
Eomellivora wimani
Ictitherium sinense
Ictitherium gaudryi
Thalassictis wongii
Hyaenictitherium hyaenoides
Aderocuta variabilis
? *Lycyaena dubia*
Machairodus palanderi
Machairodus tingii
Metailurus major
Metailurus minor
Tetralophodon exoletus
Dicerorhinus orientalis
Chilotherium habereri
Chilotherium planifrons
Chilotherium anderssoni
Acerorhinus palaeosinensis
Sinootherium lagrelii
Hipparion hippidiodus [subgenus (*Hipparion*)]
Hipparion dermatorhinum [subgenus (*Hipparion*)]
Hipparion fossatum [subgenus (*Hipparion*)]
Hipparion plocodus [subgenus (*Hipparion*)]
Hipparion forstenae [subgenus (*Cremohipparion*)]
Chleuastochoerus stehlini
Microstonyx major
Propotamochoerus hyothericoides
Cervocerus novorossiae
Procapreolus latifrons
Palaeotragus microdon
Palaeotragus cf. *coelophrys*
Samotherium sp.
Honanotherium schlosseri
Urmiaotherium intermedium
Plesiaddax depereti
Tragocerus spectabilis
Gazella paotehensis
Gazella dorcadooides
Gazella altidens
? *Tragoreas lagrelii*
? *Tragoreas anderssoni*
? *Tragoreas palaeosinensis*

Sinotragus wimani
Paraprotoryx minor
Palaeoryx sinensis

Ertemte_fauna
[Qiu and Qiu (1995) north China]
Erinaceus mongolicus
Erinaceidae indet.
Quyania chowi
Yanshuella primaeva
Talpinae indet.
? *Anourosorex* sp.
Neomyini indet.
Crocidura kormosi
Blarinella sp. [sp. nov.]
Alluvisorex sp.
Sorex sp. [spp.]
Soricinae indet.
Chiroptera indet.
Pseudaplodon asiaticus
Eutamias ertemtensis
Sciurus sp.
Sinotamias gravis
Spermophilus orientalis
Pliopetaurista rugosa
Petinomys auctor
Sinocastor anderssoni
Dipoides cf. *majori*
Myomimus sinensis
Leptodontomys gansus
Sicista sp.
Eozapus similis
Lophocricetus grabau
Lophocricetus pusillus
Paralactaga anderssoni
Brachyscirtetes wimani
Sminthoides fraudator
Sinocricetus zdanskyi
Nannocricetus mongolicus
Kowalskia neimengensis
Kowalskia similis
Microtodon atavus
Anatolomys teilhardi
Pseudomeriones abbreviatus
Prosiphneus eriksoni
Microtoscoptes praetermissus

Apodemus orientalis
Orientalomys cf. *similis*
Karnimata hipparionum
Occitanomys pusillus
Micromys chalceus
Alilepus annectens
Ochotona lagreli
Ochotona minor
Meles suillus
Promephitis alexejevi
Martes anderssoni
Martes sp.
Ictitherium aff. *hipparionum*
Viverridae indet.
Hyaena sp.
Machairodus sp.
Felis sp.
Mastodon sp.
Hipparion richthofeni
Hipparion sp.
Sinohippus zitteli
Chilotherium habereri
Propotamochoerus hyotherioides
Honanotherium sp.
Palaeotragus microdon
Axis speciosus
Procapreolus rutimeyeri
Procapreolus latifrons
Paracervulus brevis
Moschus grandaevus
Gazella sp.

Gaozhuang_fauna
[Qiu and Qiu (1995) about 4.3 Ma middle China]
Soriculus praecursus
Blarinini indet.
Yanshuella primaeva
Desmana kowalskae
Scaptochirus sp.
Eutamias cf. *ertemtensis*
Tamiasciurus sp.
Sinotamias sp.
Pliopetaurista rugosus
Sinocastor anderssoni
aff. *Dipoides majori*
Hystrix sp.

Myomimus sp.
Sminthoides fraudator
Kowalskia sp. [spp.]
Nannocricetus mongolicus
Allocricetus sp.
Prosiphneus truncatus
Prosiphneus eriksoni
Prosiphneus praetingi
Germanomys sp.
Mimomys sp.
Apodemus qiui
Micromys chalceus
Micromys tedfordi
aff. *Karnimata hipparionum*
Chardinomys yusheensis
Huaxiamys primitivus
Huaxiamys downsi
Ochotona lagreli
Alilepus sp.
Trischizolagus sp.
Hypolagus sp.
Agriotherium sp.
Ursus sp.
Plesiogulo brachygnathus
Martes sp.
Thalassictis sp.
Chasmaporthetes kani
Pliohyaena pyrenaica [subspecies *orientalis*]
Metailurus sp.
Nyctereutes tingi
Nyctereutes sinensis
Canis sp.
Mammot borsoni
Anancus sinensis
Sinomastodon intermedius
Hipparion platyodus [subgenus (*Hipparion*)]
Hipparion houfenense [subgenus (*Plesiohipparion*)]
Hipparion pater [subgenus (*Proboscidipparion*)]
Hipparion insperatum [subgenus (*Baryhipparion*)]
Hipparion licenti [subgenus (*Cremohipparion*)]
Dicerorhinus orientalis
Acerorhinus sp.
Sus erymanthius
Paracamelus sp.
Moschus sp.
Cervocerus novorossiae
Paracervulus cf. *killgusi*

Procapreolus sp.
Axis speciosus
Cervavitus demissus
Metacervulus sp.
Muntiacus cf. *lacustris*
Gazella blacki
cf. *Protoryx yushensis*
cf. *Tragoceras laticornis*
Stegodon zdanskii
.

Mazegou_fauna
[Qiu and Qiu (1995) about 2.95 Ma middle China]
cf. *Erinaceus* sp.
cf. *Blarinoides* sp. [sp. nov.]
Peisorex pliocaenicus
Yanshuella primaeva
Scaptochirus sp.
Sciurus sp.
Tamiasciurus sp.
Pliopetaurista rugosus
Sinocastor sp.
Dipoides sp.
Hystrix sp.
Myomimus sp.
Sminthoides fraudator
Rhizomys shansius
Allocricetus sp.
? *Cricetulus* sp.
Prosiphneus praetingi
Germanomys sp.
Mimomys cf. *orientalis*
Apodemus zhangwagouensis
Micromys tedfordi
Chardinomys nihewanicus
Ochotonoides complicidens
Ochotona sp.
Alilepus annectens
Hypolagus schreueri
Agriotherium sp.
Ursus sp.
Meles sp.
Chasmaporthetes sp.
Pliohyaena sp.
Crocota sp.
Metailurus sp.
Machairodus sp.

Homotherium sp.
Lynx sp.
Civettictis sp.
Nyctereutes sinensis
Canis sp.
Vulpes baihaiensis
Stegodon sp.
Anancus sp.
Sinomastodon intermedius
Archidiskodon sp.
Postschizotherium sp.
Hipparion platyodus [subgenus (*Hipparion*)]
Hipparion pater [subgenus (*Proboscidipparion*)]
Hipparion insperatum [subgenus (*Baryhipparion*)]
Dicerorhinus sp.
Sus sp.
Paracamelus sp.
Palaeotragus sp.
Axis sp.
Muntiacus sp.
Dama sp.
Rusa sp.
Gazella blacki
Antilospira licenti
Sinoryx cornucopia
Caprini indet. [gen. nov.]
Megalovis sp.
Lyrocerus sata
.

Xiashagou_fauna
[Qiu and Qiu (1995) middle China]
Erinaceus cf. *dealbatus*
Alactaga cf. *annulata*
Youngia tingi
Borsodia chinensis
Hystrix sp.
Ochotonoides complicidens
Vulpes chikushanensis
Nyctereutes sinensis
Canis chiliensis
Ursus etruscus
Pliohyaena licenti
Chasmaporthetes cf. *ossifagus*
Crocota honanensis
Lutra licenti
Mustela pachygnatha

Meles chiai
Lynx sp.
Acinonyx pleistoceneus
Megantereon nihowanensis
Homotherium cf. *crenatidens*
Dicerorhinus yunchuensis
Coelodonta sp.
Elasmotherium sp.
Nestoritherium sp.
Postschizotherium sp.
Hipparion sinensis [subgenus (*Proboscidipparion*)]
Equus sanmeniensis
Equus teilhardi
Sus cf. *lydekkeri*
Paracamelus gigas
Cervulus bohlini
Elaphurus bifurcatus
Eucladoceros boulei
Cervus elegans
Gazella sinensis
Gazella subgutturosa
Spirocerus wongi
Spirocerus peii
Antilospira robusta
Ovis shantungensis
? *Budorcas* sp.
Bison paleosinensis

Amuwusu fauna
[Qiu and Qiu (1995) Qiu (1988) north China]
Anchitherium sp.
Hipparion sp.
Erinaceidae indet.
Talpidae indet.
Heterosoricinae indet.
Ansoimyinae indet. [gen. et sp. nov.]
Rodentia indet. [*Sciurus*-group and *Tamias*-group]
Miopetaurista sp.
Monosaulax sp.
Sinocastor sp.
Keramidomys sp.
Protalactaga tunggurensis
Plesiosminthus sp.
Cricetodon sp.
Democricetodon sp.
Plesiodipus cf. *lei*

Prosiphneus sp. [sp. nov.]
Ochotona sp.
Ochotonidae indet. [gen. et sp. nov.]
.

Wuzhong_fauna
[Qiu and Qiu (1995) middle China]
Hipparion weihoense
Tetralophodon cf. *exoletus*
Acerorhinus tsaidamensis
Qurlignoria cheni
.

Bulong_fauna
[Qiu and Qiu (1995) northern Tibet middle China]
Hipparion xizangense
Chilotherium tanggulaense
Dinocrocota sp.
.

Har_Obo_fauna
[Qiu and Qiu (1995) north China]
Rhagapodemus sp.
Hypolagus sp.
Ochotona sp.
Anatolomys sp.
Microtodon sp.
Lophocricetus sp.
Microscoptes sp.
.

Bilike_fauna
[Qiu and Qiu (1995) Qiu (1988) north China]
Beremendia sp.
Drepanosorex sp.
Desmana sp.
Quyania aff. *chowi*
Yanshuella aff. *primaeva*
Talpidae indet.
Crocidura kormosi
Blarinella sp. [sp. nov.]
Sorex sp. [1]
Sorex sp. [2]
Sorex sp. [3]
Soricinae indet.
Chiroptera indet.
Spermophilina indet. [*Spermophilinus*-group]

Sinocastor cf. *anderssoni*
Myomimus cf. *sinensis*
Sicista sp. [sp. nov.]
Sicista sp.
Paralactaga sp.
Sminthoides aff. *fraudator*
Sinocricetus sp.
Kowalskia sp.
Pseudomeriones sp.
Prosiphneus sp. [sp. nov.]
Mimomys sp. [sp. nov.]
Apodemus sp. [1]
Apodemus sp. [2]
Micromys sp.
Muridae indet. [1]
Muridae indet. [2]
Hypolagus sp.
Ochotona sp.

.

Youhe_River_fauna
[Qiu and Qiu (1995) middle China]
Elephas youheensis
Hipparion pater [subgenus (*Proboscidipparion*)]
Sus subtriqueta
Cervavitus sp.
Nyctereutes sinensis
Ochotonoides cf. *complicidens*
Mimomys youhenicus
Mimomys orientalis

.

Daodi_fauna
[Qiu and Qiu (1995) Qiu (1988) north China]
Talpidae indet. [1]
Talpidae indet. [2]
Sorex sp.
cf. *Sorex* sp.
Paenelimnoecus sp.
? *Beremendia* sp.
Soricidae indet. [1]
Soricidae indet. [2]
Soricidae indet. [3]
Eucastor sp.
Prosiphneus sp.
cf. *Nannocricetus* sp.
Cricetidae indet.

Mimomys orientalis
Germanomys sp. [sp. nov.]
Orientalomys sp. [sp. nov.]
Apodemus sp.
Mus sp.
Rattus sp.
Chardinomys sp.
Paralactaga sp.
Sminthoides sp. [sp. nov.]
Pliopentalagus nihewanensis
Hypolagus schreuderi
Ochotona cf. *lagrelii*
Ochotona erythrotis
.

APPENDIX 2. Major 30 middle to late Eocene mammalian faunal lists of East Asia.
The references are indicated in each list.

Southern East Asian faunas:

Pondaung fauna

[Tsubamoto (2001) Tsubamoto et al. (2000a, b, 2002, 2003) Pondaung Fm Myanmar]

Primates

Anthropoidea

Eosimiidae

Bahinia pondaungensis

? *Eosimias* sp.

Amphipithecidae

Amphipithecus mogaungensis

Pondaungia cotteri

fam. indet.

Myanmarpithecus yarshensis

Creodonta

Hyaenodontidae

gen. et sp. nov.

"*Pterodon*" *dahkoensis*

Rodentia

Anomaluridae

gen. et sp. nov.

Ungulata

Order *et* family indet.

Hsanotherium parvum

Artiodactyla

Dichobunidae

Homacodontinae

gen. et sp. nov.

cf. gen. et sp. nov.

Suiformes

Anthracotheriidae

Anthracotherium pangan

Anthracotherium rubricae

Anthracotherium birmanicus

Anthracotherium tenuis

Helohyidae

Pakkokuhys lahirii

Ruminantia

fam. indet.

Indomeryx cotteri

Indomeryx arenae

cf. *Indomeryx cotteri*

Perissodactyla

Brontotheriidae

Sivatitanops cotteri

Sivatitanops birmanicum

Metatelmatherium? lahirii

Bunobrontops savagei

Ceratomorpha

fam. indet.

gen. et sp. indet.

Rhinoceroidea

Hyracodontidae

cf. *Ilianodon lunanensis*

Amynodontidae

Paramynodon birmanicus

gen. et sp. indet.

Tapiroidea

Fam. indet.

Indolophus guptai

Deperetellidae

Deperetella birmanica

Krabi fauna

[Ducrocq et al. (1995, 1996, 1997, 1998) Chaimanee et al. (1997) Ducrocq (1997, 1999)
Peigné et al. (2000) Marivaux et al. (2000) Tsubamoto et al. (2002) southern Thailand]

Dermoptera

Cynocephalidae

Dermotherium major

Insectivora

Fam. indet.

Chiroptera

Megachiroptera

Pteropodidae

gen. et sp. indet.

Primates

Anthropoidea

Propliopithecidae

Wailekia orientale
Wailekia sp.
Amphipithecidae
Siamopithecus eocaenus

Carnivora

Miacidae
Miacis thailandicus
?Mustelidae
indet.
?Procyonidae
indet.
Nimravidae
Nimravus sp. cf. *N. intermedius*
Hoplophoneus sp.
Caniformia
indet.

Rodentia

Ctenodactyloidea
Fam. indet. 2
Chapattimyidae
Baluchimyinae
Baluchimys krabiense

Artiodactyla

Tayassuidae
Egatochoerus jaegeri
Suidae
Siamochoerus banmarkensis
Entelodontidae
gen. et sp. indet.
Anthracotheriidae
Siamotherium krabiense
Anthracotherium chaimanei
Anthracotherium thailandicus
Bothriogenys orientalis
Bothriogenys sp. cf. *B. orientalis*
Atopotherium bangmarkensis
Anthracotheriinae
gen. et sp. nov.
Helohyidae
Progenitohyus thailandicus
Ruminantia
Lophiomerycidae
gen. et sp. nov.
?Tragulidae

gen. et sp. nov.

Perissodactyla

Helaletidae

gen. et sp. nov.

?Hyracodontidae

gen. et sp. nov.

Dongjun fauna

[Russell and Zhai (1987), Li and Ting (1983) Tsubamoto et al. (2000b) Dongjun Fm
Bose Basin southern China]

Pantodonta

Coryphodontidae

Eudinoceras crassum

Carnivora

Nimravidae

Eusmilus? sp.

Acreodi

Triisodontidae

Andrewsarchus crassum

Artiodactyla

Anthracotheriidae

Probrachyodus? sp. nov.

Perissodactyla

Brontotheriidae

Metatelmatherium sp.

cf. *Protitan* sp.

Deperetellidae

Deperetella birmanica

Teleolophus sp.

Hyracodontidae

Forstercooperia sp.

Ilianodon? sp.

Prohyracodon sp.

Amynodontidae

cf. *Gigantamynodon* sp.

Amynodon sp.

cf. *Paramynodon* sp.

Naduo fauna

[Russell and Zhai (1987), Li and Ting (1983), Ducrocq (1999), Guo et al. (1999), Liu (2001) and Tsubamoto et al. (2002) Naduo Fm Bose and Yongle Basin, southern China]

Placentalia

Order et fam. indet.

Eodesmatodon spanios

Carnivora

Hemicionidae

Cephalogale sp. nov.

cf. *Cephalogale* sp.

Amphicyonidae

Guangxicynodon sinocaliforniae

Phocoidea

Fam. indet.

Pachycynodon? sp. nov.

Creodonta

Hyaenodontidae

Propterodon? sp.

Acreodi

Mesonychidae

Guilestes acares

Guilestes sp. cf. *G. acares*

cf. *Harpagolestes* sp.

Artiodactyla

Entelodontidae

indet.

Tayassuidae

gen. nov.

Suidae

Siamochoerus viriosus

Huaxiachoerus guangxiensis

?Choeropotamidae (?Helohyidae)

gen. nov.

Anthracotheriidae

Anthracotherium rubricae

Anthracotherium birmanicus

Anthracotherium sp.

indet. ["*Bothriodon*" *chyelingensis*]

Heothema bellia

Heothema media

Ruminantia

? "Gelocidae"

Notomeryx besensis

Notomeryx major
Indomeryx cotteri
Gobiomeryx sp.
Tragulidae
indet.

Perissodactyla
Brontotheriidae
Metatelmatherium? cf. *lahirii*
Deperetellidae
Deperetella sp.
Eomoropidae
Eomoropus sp. cf. *E. quadridentatus*
Hyracodontidae
Guixia simplex
Aminodontidae
Caenolophus sp.
Paramynodon sp.
Huananodon hui

Gongkang fauna
[Russell and Zhai (1987), Li and Ting (1983), Tong and Zhao (1986), Qi and Beard (1998), Ducrocq (1999), Liu (2001) and Tsubamoto et al. (2002) Gongkang Fm Bose and Yongle Basin, southern China]

Carnivora
Felidae
Machairodontinae
gen. nov.
Nimravidae
Hoplophoneus? sp.

Primates
Sivaladapidae
Guangxilemur tongi

Artiodactyla
Tayassuidae
"*Eopecarihyus* sp. nov."
Suidae
Odoichoerus uniconus
Eocenchoerus savagei
Anthracotheriidae
Anthracotherium gungkangensis
Anthracotherium sp.
indet. ["*Bothriodon*" *tientongensis*]

Heothema media
Heothema chengbiensis
Fam. indet.
cf. *Indomeryx* sp.

Perissodactyla
Chalicotheriidae
Schizotherium nabanensis
Schizotherium sp.
Amynodontidae
Huananodon hypsodonta
Hyracodontidae
Forstercooperia sp. nov.
Guixia youjiangensis

Lower Lumeiyi fauna
[Russell and Zhai (1987), Li and Ting (1983) lower part of Lumeiyi Fm Lunan Basin,
southern China]
level: Sec2 1

Creodonta
indet.

Carnivora
Nimravidae
indet.

Tillodontia
indet.

Acreodi
Hapalodectidae
Honanodon sp.

Artiodactyla
Helohyidae
Gobiohyus sp.
Anthracotheriidae
indet.

Perissodactyla
Brontotheriidae
Protitan sp. cf. *P. robustus*
Rhinotitan sp.
indet.
Lophialetidae

Breviodon lumeiyiensis
Lophialetes expeditus
Lophialetes sp. cf. L. expeditus
Lophialetes yunnanensis
 Deperetellidae
 Deperetella sp.
 Teleolophus sp.
 Helaletidae
 Helaletes mongoliensis
 Hyrachyus lunanensis
 Hyrachyus minor
 Eomoropidae
 Lunania youngi
 Hyracodontidae
 Forstercooperia sp.
 Rhodopagus pygmaeus
 Rhodopagus minimus
 Prohyracodon sp.
 Amynodontidae
 Teilhardia pretiosa
 Teilhardia? sp.
 Caenolophus medius
 Caenolophus sp.
 Lushiamynodon menchiapuensis
 Amynodon lunanensis
 Amynodon spp.

Upper Lumeiyi fauna
 [Russell and Zhai (1987), Li and Ting (1983) and Ducrocq (1999) upper part of
 Lumeiyi Fm Lunan Basin, southern China]

Creodonta
 Hyaenodontidae
 "*Pterodon*" *dahkoensis*

Carnivora
 Miacidae
 Chailicyon crassidens
 ?Canidae (?Miacidae)
 indet.

Artiodactyla
 Entelodontidae
 Eoentelodon yunnanense
 Anthracotheriidae
 Probrachyodus panchiaoensis

indet.

Perissodactyla

Brontotheriidae

Rhinotitan quadridens

Rhinotitan sp.

Dianotitan lunanensis

indet.

Lophialetidae

Breviodon sahoensis

Deperetellidae

Deperetella dienensis

Deperetella birmanica

Teleolophus medius

Teleolophus sp. cf. *T. magnus*

Teleolophus? *rectus*

Eomoropidae

Litolophus? *ulterior*

Eomoropus sp. cf. *E. quadridentatus*

Hyracodontidae

Forstercooperia shiwopuensis

Forstercooperia sp.

Juxia sp.

Indricotherium parvum

Indricotherium sp. cf. *I. parvum*

Indricotherium? sp.

Prohyracodon progressa

Prohyracodon meridionale

Prohyracodon sp. cf. *P. orientale*

Ilianodon lunanensis

Rhinocerotidae

indet.

Amynodontidae

Amynodon altidens

Amynodon sp.

cf. *Metamynodon* sp.

cf. *Paramynodon* sp.

Xiangshan fauna

[Russell and Zhai (1987), Li and Ting (1983) and Huang (1999) Xiangshan Fm Lijiang Basin, southern China]

Creodonta

indet.

Hyaenodontidae

"Pterodon"? sp.

Acreodi

Mesonychidae

Honanodon hebetis

Honanodon sp.

Lohoodon lushiensis

Artiodactyla

Entelodontidae

Eoentelodon likiangensis

Anthracotheriidae

"*Anthracokeryx*" *sinensis*

"*Anthracothema*" *lijiangensis*

?Leptomerycidae

indet.

Perissodactyla

Brontotheriidae

Metatelmatheriinae

indet.

Lophialetidae

Lophialetes? sp.

Breviodon lumeiyiensis

Schlosseria sp.

Lijiangia zhang

Lophiodontidae

Lophiodon? spp.

Deperetellidae

Deperetella birmanica

Teleolophus xiangshanensis

Eomoropidae

Lunania youngi

Eomoropus minimus

Grangeria canina

Amynodontidae

Amynodon sp.

Caenolophus sp.

Hyracodontidae

Rhodopagus yunnanensis

Prohyracodon major

Prohyracodon meridionale

Caijiachong fauna

[Russell and Zhai (1987), Li and Ting (1983) McKenna and Bell (1997) Wang (2001a)

Caijiachong Fm Yuezhou Basin, southern China]

Insectivora

Dormaaliidae

indet.

Erinaceoidea

indet.

Chiroptera

Vespertilionoidea

indet.

?Primates

indet.

Lagomorpha

indet.

Rodentia

Cricetidae

Eucricetodon sp.

Ctenodactylidae

Karakoromys sp.

Dianomys obscuratus

Dianomys qujingensis

Youngomys yunnanensis

Youngomys pisinnus

?*Youngomys* sp.

Dipodidae

Plesiosminthus sp.

Artiodactyla

indet.

Entelodontidae

Entelodon sp.

Anthracotheriidae

Bothriodon chowi

? "Gelocidae"

cf. *Indomeryx* sp.

Leptomerycidae

Miomeryx sp.

Lophiomerycidae

Lophiomeryx sp.

Perissodactyla

Brontotheriidae

indet.

Rhinocerotidae

indet.

Amyodontidae

- Gigantamynodon giganteus*
- Gigantamynodon* sp. cf. *G. giganteus*
- Gigantamynodon* sp.
- Cadurcodon ardynensis*
- Cadurcodon* sp.
- cf. *Metamynodon* sp.
- Caenopinae indet. [*Caenolophus* sp.]

Hyracodontidae

- Indricotherium intermedium*
- Indricotherium qujingensis*
- Indricotherium* sp.
- Prohyracodon* sp.

Middle East Asian faunas:

Hetaoyuan fauna

[Tong (1997) Dashzeveg and Hooker (1997) Hetaoyuan Fm Henan middle China]

Tillodontia

- Esthonychidae
- Trogosinae
- Chungchienia sichuanica*

Insectivora

- Apternodontidae
- Iconapterodus qii*
- Palaeoryctidae
- Neoryctes qinlingensis*

Leptictida

- Didymoconidae
- Jiajianictis muricatus*
- Ardynictis zhaii*
- indet.

Chiroptera

- Archaeonycterididae?
- indet.

Scandentia

- Tupaiidae
- Eodendrogale parvum*

Lagomorpha

Leporidae

Strenulagus shipigouensis
Lushilagus? danjiangensis
Lushilagus lohoensis
Shamolagus sp.

?Leporidae

Dituberolagus venustus

Rodentia

?Ischyromyidae

indet.

Cylindrodontidae

Orientocylindrodon liguanqiaoensis
cf. *Pareumys* sp.
cf. *Mysops* spp.

Chapattimyidae

Yuomyinae

Saykanomys cf. *bohlini*
Stelmomys parvus
Boromys obtusus
Boromys brachyblastus
Zoyphiomys sinensis
Zoyphiomys grandis

Cocomyinae

Tamquammys dispinorum
Viriosomys jingweni
Tsinlingomys youngi
Chuankueimys xichuanensis

Cricetidae

Palasiomys conulus
Raricricetodon? trapezius

Zapodidae

Primisminthus yuenus

?Gemyoidea

fam. indet.

Hydentomys crybelophus
Hydentomys major

Carnivora

Miacidae

Miacis lushiensis

Creodonta

Oxyaenidae

Sarkastodon? henanensis

Hyaenodontidae
Sinopa? sp.
Prolaena parva
Propterodon sp.
Propterodon? *shipigouensis*

Acreodi

Triisodontidae
Andrewsarchus? sp.

Perissodactyla

Amyodontidae
Sianodon sp.

Lophialetidae
Lophialetes expeditus
Schlosseria hetaoyuanensis
Breviodon minutus
Breviodon sp. cf. *B. minutus*

Hyracodontidae
Rhodopagus minimus
Prohyracodon sp.

Brontotheriidae
Protitan? sp.

Deperetellidae
Deperetella sichuanensis
Teleolophus danjiangensis
Teleolophus xui

Guanzhuang fauna

[Russell and Zhai (1987), Li and Ting (1983), Wang (1988) and Dashzeveg and Hooker (1997) Guanzhuang Fm Shandong middle China]

Pantodonta

Coryphodontidae
Coryphodon? *flerowi*
Eudinoceras xintaiensis
indet.

Tillodontia

Tillotheriidae
Kuanchuanus shantunensis

Dinocerata

Uintatheriidae
indet.

Rodentia

indet.

Creodonta

Hyaenodontidae

Thinocyon? sichowensis

Condylarthra

Hyopsodontidae

Haplomylus? sp.

Heptaconodon dubium

Perissodactyla

Brontotheriidae

Palaeosyops sp.

Equidae

Propalaeotherium sinense

Propalaeotherium sp.

Eomoropidae

Grangeria canina

Deperetellidae

?Irdinolophus? shandongensis

Teleolophus sp.

Helaletidae

Hyrachyus modestus?

Hyrachyus metalophus

Hyrachyus sp.

Helaletes sp.

Lophialetidae

Lophialetes sp.

Schlosseria sp.

Breviodon minutus

Hyracodontidae

Rhodopagus zdanskyi

Rhodopagus laiwuensis

Lower Lushi fauna

[Russell and Zhai (1987), Li and Ting (1983) and Chow et al. (1996) lower part of Lushi Fm Henan middle China]

Pantodonta

Coryphodontidae

Eudinoceras sp.

Tillodontia

Esthonychidae

Trogosinae
Chungchienia lushia

Dinocerata
indet.
Uintatheriidae
Uintatherium sp.

Acreodi
Mesonychidae
indet.

Artiodactyla
Helohyidae
Gobiohyus sp.

Perissodactyla
Lophialetidae
Breviodon sp.
Lophialetes sp.

Upper Lushi fauna
[Russell and Zhai (1987), Li and Ting (1983) and Tsubamoto et al. (2002) upper part of
Lushi Fm Henan middle China]

Tillodontia
Esthonychidae
Trogosinae
indet.

Primates
Fam. indet.
Lushius qinlinensis

Pantodonta
Coryphodontidae
Eudinoceras sp.

Lagomorpha
Leporidae
Lushilagus lohoensis

Rodentia
Ctenodactylidae
Tsinlingomys youngi

Carnivora

Miacidae

Miacis lushiensis

Amphicyonidae

Cynodictis sp.

Nimravidae

cf. *Eusmilus* sp.

Creodonta

Hyaenodontidae

Hyaenodon sp.

Propterodon morrissi

Acreodi

Triisodontidae

Andrewsarchus henanensis

Andrewsarchus mongoliensis

Mesonychidae

Honanodon hebetis

Honanodon macrodontus

Lohoodon lushiensis

Artiodactyla

Dichobunidae

Dichobune sp.

Anthracotheriidae

indet. [*Anthracotherium?* spp.]

Helohyidae

Gobiohyus orientalis

Gobiohyus robustus

Perissodactyla

Amynodontidae

Sianodon honanensis

Lushiamynodon menchiapuensis

Caenolophus sp.

Lophialetidae

Breviodon minutus

Brontotheriidae

Protitan grangeri

Microtitan? sp.

Deperetellidae

Deperetella sp.

Hyracodontidae

Forstercooperia spp.

Rhodopagus minimus

Prohyracodon sp.

Helaletidae

Colodon sp.

Eomoropidae

Lunania youngi

Eomoropus sp.

Zhaili fauna

[Russell and Zhai (1987), Li and Ting (1983), Qi and Zhou (1989) Tong (1997), Beard (1998) and Huang et al. (1998) Tong et al. (1999) Guo et al. (2000) Tsubamoto et al. (2002) Zhaili Mbr upper part of Heti Fm Henan middle China]

Insectivora

Changlelestidae

Ictopidium lechei

Nyctitheriidae

Yuanqulestes qiui

Apternodontidae?

cf. *Iconapterodus* sp. II

Chiroptera

Palaeochiropterygidae

Lapichiropteryx xiei

Lapichiropteryx sp.

Archaeonycterididae

Icaronycteris? sp.

Primates

Sivaladapidae

Hoanghonius stehlini

Tarsiidae

Xanthorhysis tabrumi

Eosimiidae

Eosimias centennicus

Rodentia

Cricetidae

Pappocricetodon schaubi

Zapoidae

Primisminthus jinus

Banyuesminthus diconjugatus

Ctenodactylidae

Protataromys yuanquensis

Chapattimyidae

Yuomyinae

Anadianomys cf. *declivis*

indet.

Carnivora

Miacidae

Chailicyon crassidens

Creodonta

Hyaenodontidae

Hyaenodon yuanchuensis

Artiodactyla

Anthracotheriidae

"*Anthracokeryx*" *sinensis*

"*Anthracokeryx*" sp. cf. "*A.*" *sinensis*

Lophiomerycidae

Zhailimeryx jingweni

Perissodactyla

Brontotheriidae

Rhinotitan mongoliensis

Amynodontidae

Sharamynodon mongoliensis?

Sianodon sinensis

Amynodon sp.

Hyracodontidae

Juxia sharamurenense

Rencun fauna

[Russell and Zhai (1987), Li and Ting (1983), Tong (1997) and Tsubamoto et al. (2000b, 2002) Rencun Mbr lower part of Heti Fm Henan middle China]

Insectivora

Changlelestidae

Ictopidium sp. cf. *I. lechei*

Apternodontidae

cf. *Apternodus* sp.

Apternodontidae?

cf. *Iconapterodus* sp. I

Chiroptera

Microchiroptera

indet.

Lagomorpha

Leporidae

Strenulagus? sp.

Shamolagus sp. cf. *S. medius*
Gobiolagus sp.

Rodentia

?Ischyromyidae

Hulgana? eoertnia

Hulgana? sp.

Cricetidae

Pappocricetodon rencunensis

Raricricetodon minor

Raricricetodon zhongtiaensis

Zapoidae

Primisminthus shanghenus

Primisminthus sp. cf. *P. jinus*

Banyuesminthus uniconjugatus

cf. *Sinosminthus* sp.

Ctenodactylidae

Protataromys mianchiensis

Chapattimyidae

Yuomyinae

Yuomys cavioides

Anadianomys declivis

Xueshimys dissectus

Zodionomys longmensis

Primates

Sivaladapidae

Hoanghoniuss stehlini

Rencunius wui

Rencunius zhoui

Adapidae

indet.

Eosimiidae

Eosimias sp. cf. *E. centennicus*

Tillodontia

Esthonychidae

Trogosinae

indet.

Tillotheriidae

Adapidium huanghoensis

Creodonta

Hyaenodontidae

"*Pterodon*" sp. cf. "*P.*" *dahkoensis*

Acreodi

Hapalodectidae
Honanodon hebetis

Artiodactyla

Dichobunidae?

?*Dichobune* sp.

Anthracotheriidae

"*Anthracokeryx*" *sinensis*

Anthracosenex ambiguus

Raoellidae

Indohyus? *yuanchuensis*

Perissodactyla

Eomoropidae

Eomoropus quadridentatus

Litolophus major

?Isectolophidae

indet.

Deperetellidae

Deperetella depereti

Deperetella birmanica

Hyracodontidae

Rhodopagus? sp.

Prohyracodon sp. cf. *P. meridionale*

Amynodontidae

Sharamynodon mongoliensis

Sianodon sinensis

Sianodon mienchiensis

Amynodon? sp.

Caenolophus sp. cf. *C. promissus*

Huangzhuang_fauna

[Shi (1989), Wang (1994), Wang and Wang (1997), Tsubamoto (2001) Tsubamoto et al. (2002) Huangzhuang Fm Qufu Shandong middle China]

Mammalia

indet. [cf. "*Pterodon*" *dahkoensis*]

Rodentia

Chapattimyidae

Yuomyinae

Yuomys huangzhuangensis

Creodonta

Hyaenodontidae

cf. *Propterodon* sp.

Pantodonta

Coryphodontidae

Eudinoceras sishuiensis

Artiodactyla

Anthracotheriidae

"*Anthracokeryx*" *sinensis*

Perissodactyla

Brontotheriidae

Metatelmatheriinae

Qufutitan zhoui

Eomoropidae

Eomoropus minimus

Eomoropus quadridentatus

Lophialetidae

Breviodon minutus

Deperetellidae

Deperetella birmanica

Deperetella sp.

Amynodontidae

Caenolophus suprametalophus

Caenolophus magnus

Caenolophus proficiens

Caenolophus minimus

Caenolophus sp.

Hyracodontidae

Forstercooperia sp.

indet.

Shanghuang fauna

[Qi et al. (1991, 1996), Beard et al. (1994) and Qi and Beard (1996), Jiangsu, middle China]

Marsupialia

Didelphidae

indet.

Leptictida

Didymoconidae

Ardynictis sp.

Insectivora

Erinaceidae

indet.

Lagomorpha

indet.

Leporidae

Palaeoginae

Lushilagus lohoensis

Carnivora

Miacidae

Miacis lushiensis

Miacis gracilis

Vulpavus sp.

Canidae

Procynodictis sp.

Creodonta

Hyaenodontidae

Limnocyon sp.

"*Pterodon*" sp.

Hyaenodon sp.

indet.

Primates

Adapidae

Adapoides troglodytes

Omomyidae

Macrotarsius macrorhysis

Tarsiidae

Tarsius eocaenus

Eosimiidae

Eosimias sinensis

Rodentia

Cricetidae

Pappocricetodon antiquus

Pappocricetodon rencunensis

Pappocricetodon schaubi

Eucricetodon sp.

Ischyromyidae

gen. et sp. nov.

indet.

Chapattimyidae

Yuomyinae

indet.

Ctenodactylidae

indet.

Fam. nov.

gen. et sp. nov.

Chiroptera

Microchiroptera

indet. 1

indet. 2

Tillodontia

indet. 1

indet. 2

Condylarthra

Hyopsodontidae

indet.

Artiodactyla

Dichobunidae

Homacodontinae

gen. et sp. nov.

Entelodontidae

?*Eoentelodon* sp.

Anthracotheriidae

indet.

?Leptomerycidae

gen. et sp. nov.

Perissodactyla

Eomoropidae

Eomoropus sp.

Brontotheriidae

Nanotitan shanghuangensis

Microtitan sp. cf. *M. mongoliensis*

Helaletidae

Heptodon sp.

Helaletes mongoliensis

Helaletes sp.

Hyrachyus sp.

Hyracodontidae

Forstercooperia sp.

Rhodopagus sp.

Amynodontidae

Caenolophus sp.

Palaeotheriidae

gen. et sp. nov.

Northern East Asian faunas

Arshanto fauna

[Meng and McKenna (1998) and Dashzeveg and Hooker (1997) Arshanto Fm Nei Mongol north China]

Acreodi

Hapalodectidae

Hapalodectes? *serus*

Mesonychidae

Mongolonyx dolichognathus

Mesonyx cf. *obtusidens*

Pantodonta

Coryphodontidae

Metacoryphodon? *minor*

Metacoryphodon sp.

Metacoryphodon luminis

Pantolambdodontidae

Pantolambdodon fortis

Pantolambdodon? *minor*

Dinocerata

Uintatheriidae

Gobiatherium mirificum

Gobiatherium? *major*

Gobiatherium? *monolobotum*

cf. *Uintatherium* sp.

Leptictida

Didymoconidae

Archaeoryctes borealis

Perissodactyla

Hyracodontidae

Forstercooperia confluens

Forstercooperia huhebulakensis

Forstercooperia? *grandis*

Forstercooperia sp.

Isectolophidae

Homogalax reliquius

Lophialetidae

Schlosseria magister

Schlosseria cf. *magister*

Lophialetes expeditus

Breviodon minutus

Brontotheriidae

Protitan minor
Metatelmatherium cristatum
Microtitan? elongatus
Microtitan sp.
Desmatotitan sp.

Amyodontidae

Teilhardia pretiosa

Deperetellidae

Teleolophus cf. *medius*

Teleolophus? rectus

Teleolophus primarius

Helaletidae

Helaletes fissus

Helaletes fissus?

Helaletes medius

Heptodon minimus

Hyrachyus crista

Hyrachyus neimongoliensis

Hyrachyus sp.

cf. *Hyrachyus eximius*

Rodentia

Ischyromyidae

Asiomys dawsoni

Paramys sp.

Chapattimyidae

Tamquammys wilsoni

Advenimus burkei

Insectivora

Soricomorpha

Micropternodontidae

Sinosinopa sinensis

Irdin Manha fauna at Irdin Manha

[Meng and McKenna (1998) Lavrov (1996) Lucas et al. (1997) Irdin Manha Fm Nei Mongol north China]

Artiodactyla

Leptomerycidae

Archaeomerycinae

cf. *Archaeomeryx* sp.

Helohyidae

Gobiohyus pressidens

Gobiohyus robustus

Gobiohyus orientalis

Carnivora

Miacidae

Miacis invictus

Acreodi

Mesonychidae

Pachyaena sp.

Mesonyx sp.

indet.

Hapalodectidae

Hapalodectes serus

Triisodontidae

Andrewsarchus mongoliensis

Leptictida? (Cimolesta)

Didymoconidae

Wyolestinae

Mongoleryctes acutus

Pantodonta

Pantolestidae

?*Pantolestes* sp.

indet.

Coryphodontidae

Eudinoceras mongoliensis

Creodonta

Oxyaenidae

Sarkastodon mongoliensis

Hyaenodontidae

Neoparapterodon rechetovi

Perissodactyla

Hyracodontidae

Forstercooperia totadentata

Rhodopagus pygmaeus

Triplopus? *proficiens*

Lophialetidae

Breviodon minutus

Schlosseria sujiensis

Lophialetes sp.

Lophialetes expeditus

Brontotheriidae

Metatelmatherium parvum

Microtitan mongoliensis

Gnathotitan berkeyi
Epimanteoceras robustus
Protitan grangeri
Protitan obliquidens
Eomoropidae
Litolophus gobiensis
Deperetellidae
Teleolophus medius
Irdinolophus mongoliensis

Rodentia
Ischyromyidae
indet.

Irdin Manha fauna at Camps Margetts
[Li and Ting (1983) and Russell and Zhai (1987) Irdin Manha Fm Nei Mongol north
China]

Pantodonta
indet.

Dinocerata
Uintatheriidae
Gobiatherium mirificum

Rodentia
Paramyidae
indet.
Chapattimyidae
Cocomyinae
Advenimus burkei

Acreodi
Mesonychidae
Mongolonyx dolichognathus
Triisodontidae
Andrewsarchus mongoliensis

Perissodactyla
Brontotheriidae
Metatelmatherium cristatum
Protitan minor
Protitan? cingulatus
Eomoropidae
Litolophus gobiensis
Deperetellidae

cf. *Teleolophus medius*
Helaletidae
Helaletes fissus
Helaletes fissus?
Helaletes sp.
cf. *Hyrachyus* sp.
Lophialetidae
Lophialetes expeditus
Breviodon? sp.
cf. *Schlosseria magister*
Amynodontidae
Rostriamynodon grangeri
Hyracodontidae
Forstercooperia grandis

Ulan Shireh fauna
[Meng and McKenna (1998) Lucas et al. (1997) Nei Mongol north China]

Artiodactyla
Helohyidae
Gobiohyus orientalis

Carnivora
Miacidae
indet.

Acreodi
Mesonychidae
indet.
Harpagolestes? orientalis
Harpagolestes? serus
cf. *Mesonyx* sp.

Pantodonta
Coryphodontidae
Eudinoceras mongoliensis
Pantolambdodontidae
Pantolambdodon fortis
Pantolambdodon inermis

Creodonta
Hyaenodontidae
Propterodon sp. cf. *P. morrisoni*
Oxyaenidae
Sarkastodon mongoliensis

Lagomorpha

Leporidae

Shamolagus grangeri

Palaeolaginae

indet.

Leptictida

Didymoconidae

Kennatherium shirensis

Perissodactyla

Lophialetidae

Schlosseria ulanshirehensis

Lophialetes sp.

Lophialetes? *expeditus*

Zhongjianoletes chowi

Zhongjianoletes sp.

Breviodon minutus

Breviodon? sp.

Amynodontidae

Lushiamynodon sharamurenensis

Brontotheriidae

Epimanteoceras formosus

Acrotitan ulanshirehensis

Microtitan mongoliensis

Dolichorhinoides angustidens

Desmatotitan tukhumensis

Protitan bellus

Deperetellidae

Teleolophus medius

Hyracodontidae

Forstercooperia sp. cf. *F. grandis*

Forstercooperia sp.

Triplopus? *proficiens*

Rhodopagus pygmaeus

Rodentia

Chapattimyidae

Advenimus bohlini

cf. *Advenimus* sp.

Yuomys weijingensis

Khaychin (II, III, V) fauna

[Meng and McKenna (1998) Lavrov (1996) Mongolia]

Artiodactyla

"Hypertragulidae"
 indet.
 Helohyidae
Gobiohyus sp. nov.

Acreodi
 Mesonychidae
Mongolonyx robustus
 Hapalodectidae
Metahapalodectes makhchinus

Pantodonta
 Coryphodontidae
 cf. *Eudinoceras* sp.

Creodonta
 Hyaenodontidae
Neoparapterodon rechetovi

Insectivora
 Erinaceomorpha
 indet.
 Soricomorpha
 Apternodontidae
 indet.

Lagomorpha
 indet.

Perissodactyla
 Lophialetidae
Lophialetes expeditus
Breviodon minutus
 Arynodontidae
 indet.
 Hyracodontidae
Triplopus? proficiens
Forstercooperia totadentata
 Brontotheriidae
Protitan reshetovi
Protitan khaitshinus
Microtitan mongoliensis
 Deperetellidae
Teleolophus medius
Teleolophus sp.
Deperetella khaitchinulensis

Rodentia

Chapattimyidae

Euboromys grandis

Petrokozlovia notos

Saykanomys bohlini

Kholboldzhi-Nur fauna

[Meng and McKenna (1998) Mongolia]

Acreodi

Hapalodectidae

indet

Pantodonta

Pantolambdodontidae

Pantolambdodon bodgensis

Archaeolambda prima

Coryphodontidae

Eudinoceras kholobochiensis

cf. *Hypercoryphodon* sp.

Pantolesta

Pantolestidae

Bodgia orientalis

Lagomorpha

indet.

Perissodactyla

indet.

Isectolophidae

indet.

Hyracodontidae

Pataecops parvus

Rhodopagus sp.

indet.

Brontotheriidae

indet.

Amynodontidae

Teilhardia sp.

Lophialetidae

Breviodon sp.

Lophialetes expeditus?

Schlosseria magister

Palaeotheriidae

Gobhippus menneri

Deperetellidae
Irdinolophus tuiensis?

Shara Murun fauna
[Meng and McKenna (1998) Tsubamoto et al. (2002) Shara Murun Fm Nei Mongol
north China]

Artiodactyla
Leptomerycidae
 Archaeomerycinae
 Archaeomeryx optatus
Anthracotheriidae
 Ulausuodon parvus
 indet. [cf. *Anthracokeryx* sp.]

Creodonta
Hyaenodontidae
 “*Pterodon*” *hyaenoides*
 Propterodon cf. *morrissi*

Lagomorpha
Ochotonidae
 Desmatolagus sp.
Leporidae
 Shamolagus medius
 Gobiolagus tolmachovi

Perissodactyla
Aminodontidae
 Lushiamynodon sharamurenensis
 Caenolophus obliquus
 Caenolophus promissus
 Sianodon ulausuensis
 Sianodon sp.
 Sharamynodon mongoliensis
 cf. *Cadurcodon* sp.
 Gigantamynodon promissus
Lophialetidae
 Lophialetes sp.
Hyracodontidae
 Triplopus? progressus
 Juxia borissiaki
 Rhodopagus minimus
Brontotheriidae
 Titanodectes ingens
 Titanodectes minor

Rhinotitan andrewsi
Rhinotitan kaiseni
Rhinotitan mongoliensis
Pachytitan ajax
Metatelmatherium? (= *Manteoceras*) sp.

Deperetellidae

Deperetella cristata
Teleolophus medius?

Chalicotheriidae

Schizotherium sp.

Rodentia

Chapattimyidae

Yuomys cavioides

Urtyn (Erden) Obo fauna

[Meng and McKenna (1998) Urtyn Obo Fm Nei Mongol north China]

Artiodactyla

Entelodontidae

Entelodon sp.

Acreodi

Mesonychidae

indet

Lagomorpha

Leporidae

Gobiolagus? major

Perissodactyla

Amynodontidae

Cadurcodon ardynensis
Cadurcodon sp.
Amynodontopsis parvidens
Amynodon alxaensis

Chalicotheriidae

Schizotherium cf. *avitum*

Hyracodontidae

Ardynia praecox
Urtinotherium incisivum

Brontotheriidae

Parabrontops gobiensis

Ulan_Gochu_fauna

[Meng and McKenna (1998) and Lucas et al. (1996) Ulan Gochu Fm Nei Mongol north China]

Anagalida

Anagalidae

Anagale gobiensis

Acreodi

Mesonychidae

Mongolestes hadrodens

Lagomorpha

Leporidae

Gobiolagus andrewsi

Ochotonidae

Desmatolagus vetustus

Leptictida

Didymoconidae

indet.

Perissodactyla

Brontotheriidae

Metatitan primus

Metatitan progressus

Embolotherium grangeri

Embolotherium loucksii

Embolotherium andrewsi

Amynodontidae

Amynodontopsis sp.

Cadurcodon sp.

Zaisanamynodon borisovi

indet

Rodentia

Ischyromyidae

Hulgana ertinia

indet.

Cylindrodontidae

Ardynomys sp.

Chaganbulage_fauna

[Wang and Wang (1997) Meng and McKenna (1998) Chaganbulage Fm Nei Mongol north China]

Artiodactyla

Cervidae

indet.

Lophiomerycidae

Lophiomeryx sp. cf. *L. gracilis*

Acreodi

Mesonychidae

Harpagolestes alxaensis

Lagomorpha

Leporidae

Gobiolagus sp. cf. *G. andrewsi*

Perissodactyla

Amynodontidae

Amynodon alxaensis

Cadurcodon suhaituensis

Sianodon sp.

Rhinocerotidae

indet.

Deperetellidae

Teleolophus magnus

Teleolophus cf. *medius*

Brontotheriidae

indet.

Embolotherium grangeri

Rodentia

Ctenodactylidae

Gobiomys neimongolensis

Insectivora

indet.

Ergilin Member fauna at Ergilin Dzo

[Lucas and Emry (1996) Meng and McKenna (1998) Vislobokova (1998) Mongolia]

Artiodactyla

Anthracotheriidae

Bothriodon sp.

Entelodontidae
Entelodon gobiensis
Hypertragulidae
Praetragulus gobiae
Leptomerycidae
Miomeryx altaicus

Carnivora
Viverridae
Stenoplesictis simplex
Nimravidae
Nimravus mongoliensis

Creodonta
Hyaenodontidae
Hyaenodon sp.
"Pterodon" mongoliensis

Perissodactyla
Hyracodontidae
Forstercooperia sp.
Forstercooperia ergiliensis
Ardynia mongoliensis
Ardynia praecox
Rhinocerotidae
Ronzotherium brevirostris
Ronzotherium orientale
Amyndontidae
Cadurcodon ardynensis
Cadurcotherium progressus
Gigantamynodon cessator
Armania asiana
Brontotheriidae
Embolotherium ergiliense
Embolotherium andrewsi
Chalicotheriidae
Schizotherium avitum
Helaletidae
Colodon inceptus

Rodentia
Cylindrodontidae
Ardynomys silentii
Ardynomys olseni
Ardynomys chihi

Ergilin Member fauna at Khoer Dzan

[Meng and McKenna (1998) Lucas and Emry (1996) Vislobokova (1998) Mongolia]

Artiodactyla

Anthracotheriidae

Bothriodon sp.

Entelodontidae

Entelodon gobiensis

Ruminantia

Hypertragulidae

Praetragulus electus

Carnivora

Nimravidae

Nimravus mongoliensis

Creodonta

Hyaenodontidae

Hyaenodon incertus

Perissodactyla

Amyodontidae

Gigantamynodon cessator

Brontotheriidae

Embolotherium sp.

Chalicotheriidae

Schizotherium avitum

Eomoropidae

Eomoropus sp.

Deperetellidae

Teleolophus magnus

Hyracodontidae

Indricotherium sp.

Rhinocerotidae

Ronzotherium orientale

Sevkhul Member fauna at Khoer Dzan

[Meng and McKenna (1998) Mongolia]

Artiodactyla

Entelodontidae

Eoentelodon trofimovi

Acreodi

Mesonychidae

Mongolestes hadrodens

Metahapalodectes sp.

Creodonta

Hyaenodontidae

“Pterodon” exploratus

“Pterodon” sp.

Hyaenodon incertus

Hyaenodon eminus

Lagomorpha

Ochotonidae

Desmatolagus vetustus

Leptictida

Didymoconidae

Ardynictis furunculus

Perissodactyla

Amynodontidae

Amynodon lunanensis

Gigantamynodon cessator

Armania asiana

Hyracodontidae

Ardynia mongoliensis

Ardynia praecox

Prohyracodon meridionalis

Brontotheriidae

Embolotherium grangeri

Deperetellidae

Teleolophus magnus

Deperetella cf. *D. birmanica*

Chalicotheriidae

Schizotherium avitum

Helaletidae

Colodon inceptus

Rodentia

Cylindrodontidae

Ardynomys sp.

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