

**Article XLII.—NEW SPECIES OF THE BEE GENUS ANDRENA  
IN THE AMERICAN MUSEUM OF NATURAL HISTORY.**

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The following descriptions are contributions toward a monograph of the Pan-American species of *Andrena*:

***Andrena* (*Andrena*) *beutenmuelleri*, new species.**

*Type*.—American Museum of Natural History, New York, N. Y.

*Type locality*.—Black Mountains, North Carolina, June. (Wm. Beutenmueller.)

Related to *A. perplexa* Smith, of which it may prove to be a race or variety.

*Female*.—Length 12 mm.; *head* black with pale ochreous pubescence that is almost white on the clypeus giving the latter a cinereous appearance on each side of a median bare band, malar space almost crowded out, the malar line apparently not more than half as long as the pedicel, clypeus moderately convex, finely reticulated all over, in addition closely punctured on each side of a narrow median impunctate reticulate band that is more conspicuously shining and less conspicuously reticulate on its lower third than the rest of the clypeus, most of the punctures of the clypeus at most a puncture width apart from each other, some of them adjoining, cheeks simple, without a keel, shining and finely sculptured, felted area of facial fovea almost parallel sided and ochreous, becoming attenuated below the middle and separated from the eye margin by a punctured, shining, elevated band, facial fovea apparently extending a little below a horizontal line drawn tangent to the upper edge of the clypeus, mandibles blackish castaneous beyond the middle and at the tip, average length of third joint of antennæ as long as or at most slightly longer than the next two joints combined, antennæ blackish brown throughout, labrarea almost semicircular, subtruncate, at least two and one-half times as wide at base as long down the middle; *thorax* black with pale pubescence, the pubescence on its dorsal surface and around the tubercles bright fulvous, pubescence of rest of thorax concolorous with that on the head, dorsulum sculptured like the clypeus, the punctures however not so close together, scutellum punctured somewhat like the dorsulum, less reticulate and almost polished, fore legs, all coxæ, trochanters and femora with pubescence that is nearly concolorous with the pubescence of the head, mid-tibiæ and outer surface of mid-metatarsi with seal brown hairs, metatarsi of mid-legs and hind legs beyond the femora with bright fulvous hairs, hind tibiæ apically and hind metatarsi on the underside rather brownish stramineous to pale stramineous, brush on the inner side of hind metatarsi paler than the scopa, rather pale stramineous, hairs of the scopa loosely arranged and mostly simple, hairs at apex of hind femora and at base of hind

tibiæ dark brown, tegulæ and wing base blackish brown, wings strongly tinted with brown, the costa black, stigma pale brown, rest of veins dark brown, first recurrent vein received by the second cubital cell, nearer the second transverse cubitus than the first transverse cubitus is to the stigma on the radius, nervulus interstitial with the basal vein, decidedly arcuate and forming an acute angle with the first abscissa of the discoidal vein; *propodeum* with the apical half of its enclosure reticulate, its basal half rugose, almost plicate, a well developed line of demarkation between the enclosure and the rest of the propodeum which is reticulated and covered with scattered shallow pits, its pubescence concolorous with the pubescence of the pleuræ; *abdomen* black, almost polished, with the basal tergite and the depressed margins almost bare with fine scattered punctures, rest of abdomen sericeous with more distinct and more closely arranged punctures, anal fimbria bright fulvous, rest of abdomen with ochreous pubescence.

### **Andrena (Andrena) discolor**, new species.

*Type*.— American Museum of Natural History, New York, N. Y.

*Type locality*.— Sierra Nevada, California.

Related to *A. (A.) novæangliæ* Viereck.

*Female*.— Length 9 mm.; *head* black, its pubescence pale ochreous except on the sides of the face, on the cheeks and on the vertex where it is black and in the foveæ where it is pale seal brown fading into whitish below the middle of the foveæ, clypeus virtually without a median impunctate band, convex, punctured and polished except laterally and basally where it is minutely reticulated, its punctures one to four or more puncture widths apart, felted area of facial foveæ forming an inverted cone in outline, its base almost adjoining the upper eye margin, a short distance below the upper eye margin it is separated for the rest of its length by a narrow, parallel sided, shining, punctured area, facial foveæ with the felted area extending to or a little below the antennal line on the left side, apparently a little shorter on the right side and at most half as wide or scarcely more than half as wide as the ocellular line is long, mandibles with the apical half mostly castaneous, palpi typical, average length of the third joint of antennæ as long as or a trifle longer than the average length of next two joints combined, antennæ blackish brown, labræ truncate, at least twice as broad at apex as long down the middle, at least two and one half times as wide at base as at apex; *thorax* black, with pale ochreous pubescence, dorsulum sculptured like the base of the clypeus, scutel sculptured like the dorsulum, metanotum more densely sculptured than the scutel, legs pubescent like the thorax except that the tarsi and fore and mid tibiæ are mostly covered with pale golden brown hairs, scopal hairs loosely arranged, stramineous, hind tibiæ and tarsi brownish stramineous, the former with dark hairs at base, hind femora at apex with seal brown hairs, tegulæ and wing base castaneous, stigma dark brown, veins brownish stramineous, subcosta blackish, membrane with a brownish stramineous tinge, first recurrent vein received by the second cubital cell at the middle or a little basal of the middle, nervulus interstitial with the basal vein and forming an acute angle with the first abscissa of the discoidal vein; *propodeum* sculptured like the base of the clypeus except in the enclosure where it is mostly finely reticulate and impunctate, the enclosure poorly defined; *abdomen* black without a metallic tinge, depressed portion

of segments stramineous, abdomen shining and covered with indistinct, sparse, shallow setigerous punctures, the hair of the first and second tergites mostly rather erect and ochreous, on the rest of the tergum the hair is dark and erect except on the depressed margins where it is appressed and ochreous and in the fimbria where it is seal brown.

***Andrena (Andrena) edwardsi*, new species.**

*Type*.— American Museum of Natural History, New York, N. Y.

*Type locality*.— Moscow Mountains, Idaho, July 8, 1898.

Has characters in common with *A. (A.) washingtoni* Cockerell, *A. (A.) milwaukeeensis* Graenicher, and *A. (A.) hitei* Cockerell.

*Female*.— Length 8.5 mm.; head black, pubescence whitish except on the cheeks, vertex and sides of the face where it is blackish, facial line shorter than the trans-facial line, malar space distinct, the elevated part thereof, however, indefinite, the depression in the malar space extending virtually to the eye margin, clypeus convex, polished, with a median impunctate band, with scattered punctures, the punctures nearer to each other along the basal and lateral margins along which the clypeus is also indistinctly reticulated, cheeks without a keel, shining and polished, felted area of facial fovea almost parallel sided with its ends rounded, almost adjoining the eye margin, only a shining line between, lower edge of the fovea extending distinctly below the antennal line and apparently on a line with the base of the clypeus and at least three-fourths as wide as the ocellocular line is long, mandibles with castaneous tips, glossa and palpi typical, average length of third joint of antennæ a little longer than average length of next two joints combined, antennæ blackish brown, labrarea broadly truncate though not distinctly so, not subemarginate and at least five times as wide at base as long down the middle, the truncate not much narrower than the labrarea is wide at base; thorax with its tegument and pubescence colored like the head, dorsulum sculptured like the clypeus and covered with white and black hairs that nowhere obscure the sculpture, scutel with white and black hairs, more sparsely punctured than the dorsulum and more extensively polished, metanotum dull and finely reticulated, with white hairs like the pleuræ, mesosternum with some black and some pale hairs, coxæ, trochanters and femora with pale pubescence, tibiæ and tarsi with seal brown hairs, brush on the under side of metatarsi appearing darker than the hair on the upper side, scopa blackish brown its hair loosely arranged and mostly simple, legs dark brown, tarsi beyond metatarsi and claws paler brown, hairs at apex and posteriorly on hind femora concolorous with the scopa or nearly so, tegulæ and wing base castaneous, stigma translucent brownish, veins somewhat darker than the stigma, subcosta black, second recurrent vein received by the second cubital cell nearer to the second transverse cubitus than the first transverse cubitus is to the stigma on the radial vein, nervulus falling short of being interstitial with basal vein but forming an acute angle with the first abscissa of the discoidal vein, membrane distinctly brownish; propodium shining and finely reticulated like the metanotum, its enclosure poorly defined, propodeal flocus whitish; abdomen black, with the apical margins of the tergites brownish with a stramineous edge, without a metallic tinge, shining and covered with indefinite reticulations, first and second tergite with a few erect whitish hairs, rest of tergum with blackish or dark brown pubescence, anal fimbria dark seal brown.

**Andrena (Andrena) idahorum**, new species.

*Type*.— American Museum of Natural History, New York, N. Y.

*Type locality*.— Moscow Mountains, Idaho, July 8, 1898.

Has characters in common with *A. (A) edwardsii* Viereck, from the original description of which it differs as follows: Related to *A. peridotata* Viereck.

*Female*.— Length 12 mm., head with its pubescence including temples and foveæ, pale ochreous, depression of the malar space not extending virtually to the eye margin, the elevated portion, however, distinctly shorter than the depressed portion, clypeus with its middle third somewhat flattened, shining, with a narrow median impunctate welt with many of its punctures adjoining each other and apparently not nearer to each other along the margins except on the lateral margin of the lower half, clypeus reticulated in addition to being punctured along the basal and lateral margins, felted area of the facial foveæ parallel sided on its upper half but gradually narrowing to a rounded point on its lower half, a shining, sparsely punctured band between the fovea and the eye margin, apical half of mandibles mostly dark reddish, average length of third joint of antennæ apparently as long as the next two joints combined, labræa distinctly broadly truncate, not submarginate and at least three times as broad at base as long down the middle, its sides apparently as long as the truncature is wide; *thorax* with its dorsulum sculptured like the clypeus where the clypeus is punctured and reticulated, its pubescence uniformly pale ochreous, concolorous with the pubescence of the head and the rest of the thorax, scutellum more densely sculptured than the dorsulum, not at all polished, sculpture of metanotum apparently even denser than that of the scutellum, scopa pale ochreous, tarsi beyond metatarsi and claws also dark brown, concolorous with the metatarsi, hairs at apex and posteriorly on hind femora concolorous with the dark brown hairs on the upper side of the hind tibiæ at base, nervulus interstitial with the basal vein; *propodeum* dull and finely reticulated, its enclosure well defined, also with rugæ at its base; *abdomen* with its first and second tergites with some ochreous hairs, rest of tergum with dark brown hairs, anal fimbria bright seal brown.