

PP52. GLUCOSIDE COUMARINS FROM THE N-BUOH PART OF THE ROOTS OF *PRANGOS PABULARIA*

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Prangos belongs to the Apiaceae family. It's widely distributed from the Mediterranean region to the Western and Central Asia. *P. pabularia* is one of the most investigated species among the 72 species and it's indigenous to India [1]. This plant produces a large number of coumarins and has been found to be relatively rich in secondary metabolic products [2]. The *n*-butanol fraction (100 g) was applied to the silica gel column (100-200 mesh), and eluted with a gradient solvent of dichloromethane: methanol by increasing the polarity. Five individual compounds were obtained by further isolation and purification of the obtained fractions by different chromatography techniques and semi-preparative HPLC. The structures of individual compounds were established according to the spectroscopic data ID, 2D NMR, HR-MS and comparison of the obtained data with the reported data. Isolated compounds from this fraction were identified as yuganin B (**1**), 1'-O- β -D-glucopyranosyl-(2'S)-marmesin (**2**) [3], oxypeucedanin hydrate 3'-O- β -D-glucopyranoside (**3**), duharin B (**4**) [4] and 1'-O- β -D-glucopyranosyl-(2'S,3'R)-3'-hydroxymarmesin (**5**). Compound **1** was a new coumarin, while compounds **2**, **4** and **5** were isolated from this species for the first time.

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REFERENCES

- [1] Sharma N, Ashok PK, Negi A, Lakshmayya B. J. Nat. Rem. 2013; 13: 68.
- [2] Tada Y, Shikishima Y, Takaishi Y, Shibata H, Higuti T, Honda G, Ito M, Takeda Y, Kodzhimatov OK, Ashurmetov O, Ohmoto Y. Phytochemistry. 2002; 59: 649.
- [3] Niu XM, Li SH, Jiang B, Zhao QS, Sun HD. J. Asian Nat. Prod. Res. 2002; 4: 33.
- [4] Zhao XZ, Feng X, Jia XD, Wang M, Shan Y, Dong YF. Chem. Nat. Compd. 2007; 43: 399.