

The results obtained permit two possible structures, IV and V, to be suggested for spireine.

#### REFERENCES

1. V. I. Frolova, A. I. Ban'kovskii, A. D. Kuzovkov, and M. M. Molodozhnikov, *Med. prom. SSR*, no. 1, 19, 1964.
2. M. Toda, Y. Hirata. *Tetrah. Let.* 5565, 1968.

6 March 1969

All-Union Scientific-Research Institute for Medicinal Plants  
Institute of Organic Chemistry AS USSR

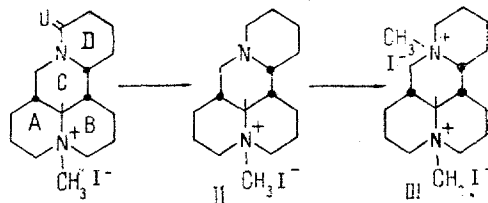
UDC 547.944/945

#### THE CONFIGURATION OF SOPHORIDINE

A. I. Begisheva, Z. U. Petrochenko, Kh. A. Aslanov, and A. S. Sadykov

*Khimiya Prirodnikh Soedinenii*, Vol. 5, No. 5, p. 455, 1969

It has been shown previously [1] that in the lactam-containing alkaloid sophoridine [2, 3] the C/D rings are syn-cis-linked. To confirm this, the methiodide of sophoridine (I) was reduced with  $\text{LiAlH}_4$ . A product was obtained the methiodide of which was identical with the dimethiodide of sophoridane (III). Consequently, reduction given sophoridane monomethiodide (II) in which the free pair of the nitrogen atom of the trans-quinolizidine (A/B) system is blocked.



The IR spectra of I exhibits the band of a lactam carbonyl ( $1640\text{ cm}^{-1}$ ) and lacks the band of a trans-quinolizidine system ( $2800\text{--}2700\text{ cm}^{-1}$ ). The spectrum of II lacks the bands of both a lactam carbonyl and a trans-quinolizidine system, which indicates the cis-linkage of rings C/D in sophoridine.

#### REFERENCES

1. A. I. Begisheva, Kh. A. Aslanov, and A. S. Sadykov, *DAN UzSSSR*, No. 6, 25, 1967.
2. F. Rulko and N. F. Proskurina, *ZhOKh*, 31, 308, 1961.
3. F. Rulko and N. F. Proskurina, *ZhOKh*, 32, 1960, 1962.

26 March 1969

Lenin Tashkent State University

UDC 547.944/945

#### THE STRUCTURE OF BUCHARIDINE

Z. Sh. Faizutdinova, I. A. Bessonova, and S. Yu. Yunusov

*Khimiya Prirodnikh Soedinenii*, Vol. 5, No. 5, pp. 455-456, 1969

In the chromatographic separation of the combined alkaloids of *Haplophyllum bucharicum* Litv. we obtained a phenolic base with mp  $251\text{--}252^\circ\text{C}$  having the composition  $\text{C}_{19}\text{H}_{25}\text{O}_4\text{N}$ , mol. wt. 331 (mass spectrometry), and we have called it bucharidine.