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Data Article

Development of data for the identification and characterization of proteins found in *Rhodnius prolixus*, *Triatoma lecticularia* and *Panstrongylus herreri*

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ABSTRACT

The data presented here were obtained from the saliva of three triatominae, *Rhodnius prolixus*, *Triatoma lecticularia* and *Panstrongylus herreri* from Montandon et al. study, doi:10.1016/j.ibmb.2016.02.009 [3]. These data were obtained from spectra generated by the mass spectrometry of proteins observed through the analysis of 2-D electrophoretic profiles. The data were analyzed according to the UniProt code, protein name, protein group, isoelectric point and molecular weight, electrophoretic profile, molecular mass referring to UniProt, volume percentage referring to the spot of the electrophoretic profile, number of peptides and percent coverage found by mass spectrometry related to the particular proteins. In addition, there characterizations made the most

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significant protein per spot, and also characterizations made for biological processes and molecular functions for all identified proteins.

Specifications Table

Subject area	Biology
More specific subject area	Biochemistry of macromolecules and entomology
Type of data	Table
How data was acquired	2-D Electrophoresis and Mass spectrometry
Data format	Analyzed
Experimental factors	Purified proteins of triatomine bugs saliva
Experimental features	Acquisition of aspects relating to the spots of the 2-D electrophoretic profiles by mass spectrometry, followed by bioinformatics analysis
Data source location	N/A
Data accessibility	The data are available with this article

Value of the data

- The data reveals a set of proteins in the saliva of three species of triatomine (*R. prolixus*, *T. lecticularia* and *P. herreri*), which were characterized by 2-D Electrophoresis, Mass Spectrometry and Treatment of Bioinformatics.
- The data is valuable to the study of correlation with other species of triatomine, or even with other bloodsucking arthropods.
- The data may help to elucidate mechanisms and pathways by which the blood-sucking arthropods perform blood feeding.
- The set of proteins were found provide support in the selection of biomolecules with potential biotechnological use, for example, in the manufacture of drugs.

1. Data

The data in Tables 1–3 were acquired by analyzing the spectra related to the spots highlighted in the 2-D protein profiles of the saliva of the triatominae *Rhodnius prolixus*, *Triatoma lecticularia* and *Panstrongylus herreri*.

Table 1 refers to all proteins found in each spot for the three species. It shows the following characteristics for each protein: species, spot related to the electrophoretic profile, UniProt code, protein name, protein group, isoelectric point (pI) and molecular weight (MW) for each electrophoretic profile, molecular mass referring to UniProt, volume percentage referring to the spot of the electrophoretic profile (vol%), number of peptides (#Pep) and percent coverage found by mass spectrometry related to that particular protein.

Table 2 refers to the most significant protein per spot (MSP) for the three species under study. It shows the same characteristics shown in Table 1 for each protein.