



United States Office of Personnel Management

Office of Merit Systems Oversight and Effectiveness

Digest of Significant Classification Decisions and Opinions

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Article No. 29-01

Standards: Physical Science Technician Series, GS-1311 (April 1967)
Job Family Position Classification Standard for Technical Work in the Physical Sciences Group, GS-1300 (August 2002) [\[PDF\]](#)[\[HTML\]](#)

Factor: N/A

Issue: Selecting an appropriate standard when the work substantially exceeds the grading criteria in the occupational standard or Job Family Standard (JFS)

Identification of the Classification Issue

The appellant's position was classified as Physical Science Technician, GS-1311-11, prior to development and issuance of the new JFS for Technical Work in the Physical Sciences Group, GS-1300 (GS-1300T). The appellant believed the position should be classified at a higher grade. Our analysis of the position, using the GS-1311 standard, supported the current grade level.

Although the appeal was adjudicated well before release of the GS-1300T JFS, we believe it is important to describe basic classification principles for application of the new standard and for evaluation of Factor 1. We did not do a complete analysis of the position against all of the factors in the new JFS.

Resolution

The appellant utilized extensive knowledge of mass spectrometry to develop assay systems for the analysis of complex biochemical compounds. He also used highly complex equipment to perform state-of-the-art instrumental analysis of organic compounds. The appellant provided authoritative interpretations of the results of mass spectra and was called upon to judge the feasibility of using mass spectrometry in individual research studies. His supervisor and research scientists within and outside his facility asked for advice on the optimum use of this instrumental analysis on specific studies or problems. The appellant performed analyses on

samples that perplexed others, identified substances previously unknown, and developed analytical techniques in the use of mass spectrometry that became the subject of articles and abstracts in professional literature. He subsequently authored, co-authored, or provided written contributions to many of the articles and abstracts. Since the appellant worked with analytical instrumentation and methods rather than research and theory of physical sciences, OPM found that the position was properly evaluated by application of the JFS for Technical Work. By themselves, contributions to scientific articles and abstracts would not be justification to use another standard, such as the JFS for Professional Work in the Physical Sciences Group (1300P), because technicians often make such contributions since they run the analytical testing.

With the combination of the appellant's level of responsibility and complexity of the work, OPM's original decision found that the position fully met, but did not exceed, the GS-11 level. In reviewing the criteria in the GS-1300T JFS, we focused on Level 1-7 to determine its applicability to the appealed position. The paramount requirement in the appellant's technician work was practical knowledge of relevant scientific principles, along with expertise in refining and developing analytical techniques, methods, and approaches. We determined that the appellant possessed comprehensive knowledge of the use of instrumental analysis, including mass spectrometry, various complex equipment, and numerous processes, techniques, and procedures to analyze complex scientific data and develop new approaches and procedures. Level 1-7 best represents the level of knowledge required for the appealed position.

“Back to the Basics”

Normally, technician positions are evaluated only against standards for technician work. The qualifications required for technician work are so different from those required for professional work that the distinctions have a marked impact on grade level. When the work of a position exceeds the grading criteria in the occupational standard or JFS, the work may be evaluated by cross reference to another appropriate standard. The selected standard should cover work as similar as possible to the work being evaluated in terms of the nature of assignments (e.g., the kind of work process, function, or subject matter involved); the qualifications (knowledge, skills, and abilities) required; the level of difficulty and responsibility; the intent of the position; and the combination of classification factors that have the greatest influence on the grade level.

With the issuance of the GS-1300T JFS, the GS-11 level can be reached by direct application of the criteria in the JFS. The “How to Use These Grading Criteria” section of that standard contains cautionary language regarding the use of a professional standard as a cross reference for evaluating technician work. In rare instances where the work may exceed the grade level criteria, a professional standard may be used to evaluate the technician position. However, the criteria in the professional standard must be applied in its entirety. The criteria must not be applied on a piecemeal basis or taken out of context. Using a standard in such instances requires a careful analytical comparison of the relationship of the position being evaluated with the intent of the criteria being used and sound classification judgment.