

Universal Multiple-Octet Coded Character Set  
 International Organization for Standardization  
 Organisation Internationale de Normalisation  
 Международная организация по стандартизации

**Doc Type: Working Group Document**

**Title: Proposal to encode a Low One Dot Leader in the UCS**

**Source: Abteilung für Griechische und Lateinische Philologie der Ludwig-Maximilians-Universität München (Department of Greek and Latin Philology, Ludwig-Maximilians-University of Munich, Germany)**

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**Status: Expert Contribution**

**Action: For consideration by JTC1/SC2/WG2 and UTC**

**Date: 2011-10-17**

## 1. Introduction

Several critical editions of papyri written in classical Greek use a "low dot" (i.e. a dot which is placed below the baseline) as a placeholder for a character unreadable in the original source. It is used in editions which present the text using modern punctuation, especially the full stop. Therefore, it is a different character which is visually distinguished from the full stop by its vertical placement.

The character, being a placeholder by its nature, shows more side bearings (lateral whitespace) than ordinary punctuation marks like the full stop. Showing this behavior, it is comparable to U+2024 ONE DOT LEADER. Therefore, its name is selected after that character.

Note that the examples are from works edited at considerably different times (1965 resp. 2009).

The character is needed to cite such editions correctly and unambiguously in scientific work.

## 2. Encoding Considerations

The low dot is proposed as a punctuation mark, following the classification of U+2024 ONE DOT LEADER.

This also has the advantage that the character is placed in the charts near the visually related U+2E33 RAISED DOT (in fact, its vertical positioning is approximately symmetrical to that character in relation to the baseline).

## 3. Proposed Character

**Block: Supplemental Punctuation (2E00-2E7F)**

### Papyrological Symbol

- U+2E43 LOW ONE DOT LEADER
  - 0323 combining dot below
  - 2024 one dot leader
  - indicates a character not readable in the source
  - glyph position is below the baseline
  - usually has more side bearings than a full stop

### Properties:

U+2E43 LOW ONE DOT LEADER;Po;0;ON;;;;;N;;;;;

#### 4. References

- [1] Pfeiffer, Rudolf : Callimachus, vol. I: fragmenta. – Oxford 1949 (corrected reprint 1965)  
[2] The Egypt Exploration Society: The Oxyrhynchus Papyri, vol. LXXIII – London 2009, ISBN 978 0 85698 182 1

#### 5. Examples and Figures

For all figures:

**Marked red:** LOW ONE DOT LEADER.

**Marked green:** U+002E FULL STOP, showing the contrastive use.

Fig. 1: From [1], p.224..

224 LYRICA, FR. 229 6–13  
]οδ.κ[.]υκλ.[.]θιν ὀμαρτεῖν· ἐτ[εὸ]ν γάρ ἐστιν  
]κοι πατρόθεν τῶν ἀπὸ Δαίτε[ω], τὸ δὲ πρὸς τεκούσης  
]. Λαπίθην α[...].δ. κειομ[.] εὐγένει[ο]ν. ←  
]το[.]δ' ἔφ[...].υδ. ιδω. ἀνέπαλτ[ο θ]υμός·  
10 ]οι τέμ[ε]ν[ο]ς [κα]λὸν ἐν ὕλη, τόθι πρῶτον ὤφθης,

Fig. 2: from [2], p.153.

25 τὸ προκείμενον ε. ( ) ἔ[ν  
καὶ μενεῖ μοι ἡ γεωργία  
ἐπὶ μόνοις τοῖς τὸ διελθ(όν)  
ι (ἔτος) τελεσθεῖσι τελέσμασι.

Fig. 3: from [2], p.66, showing use in the critical apparatus.

Fr. I col. i  
2 ]·, vertical trace [·, prob. c 3 τ: right end of horizontal or descending stroke,  
suggesting λ, ε or λ π corrected from ε by overwriting, probably *scribendo* 4 η, λ, or π, or  
possibly ι or ν 5 ν: θ, ο or ω ο·[: ε, θ, ο, or c, followed by left end of low horizontal.

**ISO/IEC JTC 1/SC 2/WG 2  
PROPOSAL SUMMARY FORM TO ACCOMPANY SUBMISSIONS  
FOR ADDITIONS TO THE REPERTOIRE OF ISO/IEC 10646<sup>1</sup>**

**Please fill all the sections A, B and C below.**

Please read Principles and Procedures Document (P & P) from <http://www.dkuug.dk/JTC1/SC2/WG2/docs/principles.html> for guidelines and details before filling this form.

Please ensure you are using the latest Form from <http://www.dkuug.dk/JTC1/SC2/WG2/docs/summaryform.html>.

See also <http://www.dkuug.dk/JTC1/SC2/WG2/docs/roadmaps.html> for latest Roadmaps.

**A. Administrative**

1. Title:	<i>Proposal to encode a Low Dot in the UCS</i>
2. Requester's name:	<i>Martin Schrage; Karl Pentzlin</i>
3. Requester type (Member body/Liaison/Individual contribution):	<i>Expert Contribution</i>
4. Submission date:	<i>2011-10-17</i>
5. Requester's reference (if applicable):	<i>University of Munich, Germany (M. S.)</i>
6. Choose one of the following:	
This is a complete proposal:	<input type="checkbox"/> Yes
(or) More information will be provided later:	<input type="checkbox"/>

**B. Technical – General**

1. Choose one of the following:		
a. This proposal is for a new script (set of characters):	<input type="checkbox"/> No	
Proposed name of script:		
b. The proposal is for addition of character(s) to an existing block:	<input type="checkbox"/> Yes	
Name of the existing block:	<i>Supplemental Punctuation</i>	
2. Number of characters in proposal:	<input type="checkbox"/> 1	
3. Proposed category (select one from below - see section 2.2 of P&P document):		
A-Contemporary <input type="checkbox"/>	B.1-Specialized (small collection) <input checked="" type="checkbox"/>	B.2-Specialized (large collection) <input type="checkbox"/>
C-Major extinct <input type="checkbox"/>	D-Attested extinct <input type="checkbox"/>	E-Minor extinct <input type="checkbox"/>
F-Archaic Hieroglyphic or Ideographic <input type="checkbox"/>	G-Obscure or questionable usage symbols <input type="checkbox"/>	
4. Is a repertoire including character names provided?	<input type="checkbox"/> Yes	
a. If YES, are the names in accordance with the "character naming guidelines" in Annex L of P&P document?	<input type="checkbox"/> Yes	
b. Are the character shapes attached in a legible form suitable for review?	<input type="checkbox"/> Yes	
5. Fonts related:		
a. Who will provide the appropriate computerized font to the Project Editor of 10646 for publishing the standard?	<i>Not necessary, as the glyph can be derived from any font</i>	
b. Identify the party granting a license for use of the font by the editors (include address, e-mail, ftp-site, etc.):		
6. References:		
a. Are references (to other character sets, dictionaries, descriptive texts etc.) provided?	<input type="checkbox"/> Yes	
b. Are published examples of use (such as samples from newspapers, magazines, or other sources) of proposed characters attached?	<input type="checkbox"/> Yes	
7. Special encoding issues:		
Does the proposal address other aspects of character data processing (if applicable) such as input, presentation, sorting, searching, indexing, transliteration etc. (if yes please enclose information)?	<input type="checkbox"/> No	

**8. Additional Information:**

Submitters are invited to provide any additional information about Properties of the proposed Character(s) or Script that will assist in correct understanding of and correct linguistic processing of the proposed character(s) or script. Examples of such properties are: Casing information, Numeric information, Currency information, Display behaviour information such as line breaks, widths etc., Combining behaviour, Spacing behaviour, Directional behaviour, Default Collation behaviour, relevance in Mark Up contexts, Compatibility equivalence and other Unicode normalization related information. See the Unicode standard at <http://www.unicode.org> for such information on other scripts. Also see <http://www.unicode.org/Public/UNIDATA/UCD.html> and associated Unicode Technical Reports for information needed for consideration by the Unicode Technical Committee for inclusion in the Unicode Standard.

<sup>1</sup> Form number: N3702-F (Original 1994-10-14; Revised 1995-01, 1995-04, 1996-04, 1996-08, 1999-03, 2001-05, 2001-09, 2003-11, 2005-01, 2005-09, 2005-10, 2007-03, 2008-05, 2009-11)

**C. Technical - Justification**

1. Has this proposal for addition of character(s) been submitted before? If YES explain	No
2. Has contact been made to members of the user community (for example: National Body, user groups of the script or characters, other experts, etc.)? If YES, with whom? If YES, available relevant documents:	Yes <i>One of the authors (M. S.) is a member of the scientific community himself</i> <i>See text</i>
3. Information on the user community for the proposed characters (for example: size, demographics, information technology use, or publishing use) is included? Reference:	Yes <i>See text</i>
4. The context of use for the proposed characters (type of use; common or rare) Reference:	Common scientific <i>See text</i>
5. Are the proposed characters in current use by the user community? If YES, where? Reference:	Yes <i>See text</i>
6. After giving due considerations to the principles in the P&P document must the proposed characters be entirely in the BMP? If YES, is a rationale provided? If YES, reference:	Yes Yes <i>To keep them in line with related characters</i>
7. Should the proposed characters be kept together in a contiguous range (rather than being scattered)?	n/a
8. Can any of the proposed characters be considered a presentation form of an existing character or character sequence? If YES, is a rationale for its inclusion provided? If YES, reference:	No
9. Can any of the proposed characters be encoded using a composed character sequence of either existing characters or other proposed characters? If YES, is a rationale for its inclusion provided? If YES, reference:	No
10. Can any of the proposed character(s) be considered to be similar (in appearance or function) to an existing character? If YES, is a rationale for its inclusion provided? If YES, reference:	No
11. Does the proposal include use of combining characters and/or use of composite sequences? If YES, is a rationale for such use provided? If YES, reference: Is a list of composite sequences and their corresponding glyph images (graphic symbols) provided? If YES, reference:	No
12. Does the proposal contain characters with any special properties such as control function or similar semantics? If YES, describe in detail (include attachment if necessary)	No
13. Does the proposal contain any Ideographic compatibility character(s)? If YES, is the equivalent corresponding unified ideographic character(s) identified? If YES, reference:	No