

ERRATA

Addendum to "Rings with Noetherian Spectrum"

By Jack Ohm and R. L. Pendleton, vol. 35 (1968), pp. 631–639.

The proof of our main theorem breaks up into two parts: (i) (Proposition 3.4). If R has (JN) , then R' has (JFC) , and (ii) (Theorem 3.6). If R has (JN) and R' has (JFC) , then R' has (JN) . The crux of the proof occurs in (i), but William Heinzer has pointed out that the argument can be simplified by replacing (ii) by the following:

THEOREM. *A commutative ring R has (JFC) (if and) only if R has (JN) .*

Proof.

Suppose $A_1 < A_2 < \cdots$ is a strictly ascending chain of J -radical ideals. $A_i < A_{i+1}$ implies there exists a maximal ideal $M_i \supset A_i$ such that $A_{i+1} \not\subset M_i$. Let $A = (A_1, M_1 A_2, M_1 M_2 A_3, \cdots)$. $A \subset M_i$ for all i and $M_i \neq M_j$ for $i \neq j$. Claim: M_i is a minimal prime divisor of A (and hence is *a fortiori* a J -component of A). For, if $A \subset P < M_i$, P prime, then $A_j \subset P$ for all j . This implies $A_{i+1} \subset M_i$, a contradiction. Thus, A has infinitely many J -components.

Q.E.D.

Lee Baric, *Some notes on sequences which are similar or related to a Schauder basis*, vol. 35(1968), pp. 1–7.

page 4, line 7, " $\epsilon \epsilon$ " should read " χ ".

page 6, in statement of Corollary 211, "equivalent" should be changed to "related".