



## Recommendation 3: Acute Phase Reactants in Patients with UPIA

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## Learning Objectives

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**At the end of this section participants should be able to:**

- **Explain the role of acute phase reactants (APR) in predicting specific diagnoses in patients with UPIA**
- **Explain the role of APR in predicting prognosis in UPIA**
- **Describe the utility of repeating APR over time**

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**ESR and CRP should be performed at baseline in the work up for diagnosis [2b, B] and prognosis [2b, B] of UPIA and repeated when clinically relevant [5, D].**

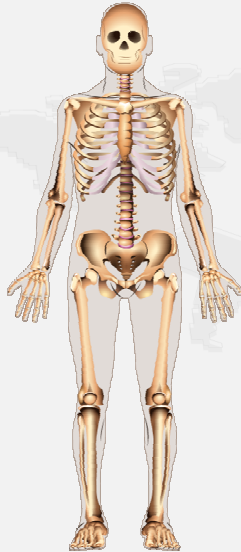
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This recommendation had a strong agreement of 9.1/10.

91% of rheumatologists felt that this recommendation was already implemented in their practice.

## Undifferentiated Arthritis



### Undifferentiated Arthritis

- Early stage of classifiable disease
- Part of an overlap of disease
- Partial form of a defined disease
- Disease of unknown origin

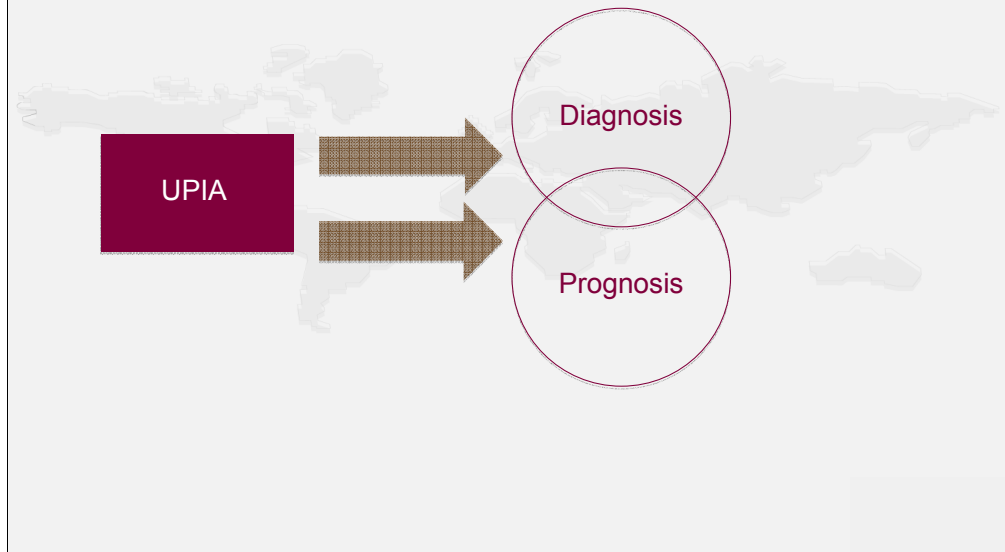
UA envelops a heterogeneous group of recent onset arthritides that are not classifiable within established criteria sets such as those of the American College of Rheumatology (ACR) and The European League Against Rheumatism (EULAR).

UA may represent an early stage of a classified form of arthritis that will eventually be definable; an overlap of more than one disease; a partial form of a defined disease; or a disease of unknown origin. UA overall has a better prognosis than RA as it encompasses a spectrum of self-limited disorders. As compared to RA, a patient with UA usually presents with fewer affected joints, less radiographic erosions, better functional ability, and a greater likelihood of being seronegative. Patients with UA are also less likely than patients with RA to require treatment that involves the use of corticosteroids (such as Prednisone) or DMARDs and a substantial proportion of UA patients remit spontaneously.

Hitchon CA, Peschken CA, Shaikh S, El-Gabalawy HS. Early undifferentiated arthritis. *Rheum Dis Clin N Am*. 2005;31:605-626.

## Predictors of Diagnosis and Prognosis Overlap

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There is considerable overlap between *diagnostic* predictors and *prognostic* predictors, as a diagnosis infers prognostic information pertaining to that diagnosis.

## ESR and CRP can predict diagnosis/prognosis in UPIA



	ESR	CRP
<b>Diagnosis</b>		
-RA	Some value	Some value
-SpA	x	No value
<b>Prognosis</b>		
-Persistence	No value	Some value
-X-ray progression	x	Some value
-Structural damage	No value	x
-Functional disability	x	Some value

x = no studies available which address this question

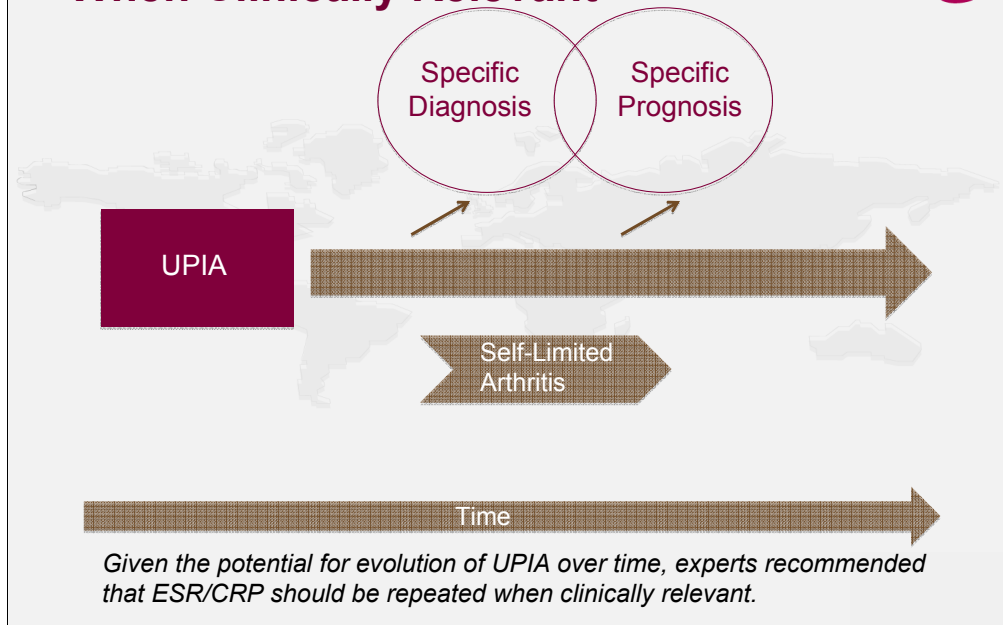
ESR and CRP can help predict diagnosis/prognosis in UPIA.

- From the systematic review, there was no data available concerning *the fact whether* acute phase reactants should repeated at certain time-intervals

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## Repeat Acute Phase Reactants When Clinically Relevant

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Given the potential for evolution of UPIA over time, experts recommended that ESR/CRP should be repeated when clinically relevant.



## Other Acute Phase Reactants

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- **Evidence for other acute phase reactants – Interleukins, ferritin, MMP – were poor, and were not included in the recommendation**

### Other Acute Phase Reactants

- Evidence for other acute phase reactants: Interleukins, ferritin, MMP were poor, and were not included in the recommendation

## Summary

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- **Of the acute phase reactants, ESR and CRP have some utility in predicting a diagnosis of RA**
- **CRP has some prognostic value in predicting persistent arthritis, radiological progression and functional disability**
- **ESR and CRP should be repeated over time when clinically relevant**

### Summary

- Of the acute phase reactants, ESR and CRP have some utility in predicting a diagnosis of RA
- CRP has some prognostic value in predicting persistent arthritis, radiological progression and functional disability
- ESR and CRP should be repeated over time when clinically relevant

## References



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