patients. In our cohort, patients with Anti-CarP antibodies presented higher tobacco consumption and poorer disease outcomes.

Table 1. Demographic and Clinical Features According to Anti-CarP Status

	Anti-CarP positive n: 73	Anti-CarP negative n: 85
Female	52 (71.2%)	71 (83.5%)
Mean age at diagnosis (SD)	53.6 (±11.9)	53.8 (±14.4)
Mean age at inclusion (SD)	58.7 (±11.9)	58.9 (±14.1)
Extra-articular manifestations	21 (28.8%)	15 (17.6%)
Disease duration (SD)	5.1 (±2.7)	5.0 (±2.7)
Smoking history	40 (54.8%)	32 (37.6%) *
• Previous and/or current	18 (24.7%)	10 (11.8%) *
• Current		
RA family history	12 (16.4%)	10 (11.8%)
BMI	27.5 (±4.5)	27.1 (±4.5)
Disease presentation at initiation (%)	15 (20.5%)	14 (16.5%)
• Palindromic rheumatism	7 (9.6%)	6 (7.1%)
• Inflammatory arthralgia	4 (5.5%)	1 (1.2%)
• Pseudopolyarthralgia	47 (64.4%)	64 (75.3%)
• Polyarthralgia		
Mean DAS28 (SD):	3.0 (±1.3)	2.8 (±1.2)
• Remission/Low	65.8%	68.2%
Mean DAS28 PCR (SD):	2.7 (±1.2)	2.4 (±1.1)
• Remission/Low	72.6%	80.0%
Mean CDAI (SD):	9.2 (±8.2)	7.2 (±6.5)
• Remission/Low	71.2%	80.0%
Mean SDAI (SD):	10.2 (±8.6)	7.8 (±6.9)
• Remission/Low	68.5%	77.6%
Mean RAPID3 (SD):	10.2 (±8.6)	7.8 (±6.9)
• Remission/Low	47.2%	48.2%
Mean HAQ (SD)	0.45 (±0.52)	0.29 (±0.39)
Poor HAQ (>1)	17 (23.3%)	7 (8.3%) **
Pain Analogue Scale mm (SD)	27.6 (±29.8)	20.6 (±22.7)
Treatment:	44 (61.1%)	49 (57.6%)
• Glucocorticoids	63 (86.3%)	71 (83.5%)
• cDMARDs	48 (65.8%)	56 (65.9%)
• MTX	7 (9.6%)	12 (14.1%)
• HCQ	14 (19.2%)	14 (16.5%)
• LEF	17 (23.3%)	32 (37.6%)
• bDMARDs		
Erosive disease	37 (50.7%)	46 (54.8%)
Modified Larsen Score	23.6 (±15.7)	15.7 (±12.6) **

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THU0069

RHEUMATOID CACHEXIA ASSESSED BY BODY COMPOSITION IS ASSOCIATED WITH WORSE DISEASE IN RHEUMATOID ARTHRITIS PATIENTS WITH NORMAL BODY MASS INDEX

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Background: Abnormal body composition (BC) has been reported in rheumatoid arthritis (RA) patients with normal body mass index (BMI). Rheumatoid cachexia (RC) was found in RA patients with a decrease in muscle mass and an increase or limited change in fat mass, resulting in no or limited changes in BMI. However, there is no consensus on the clinical criteria for its diagnosis, and the clinical significance of RC has not been well known until now.

Objectives: To investigate the characteristics of BC in RA patients with normal BMI and the association between RC and disease characteristics.

Methods: Consecutive RA patients were recruited and clinical data including disease activity, function and radiographic assessment were collected. BC was assessed by bioelectric impedance analysis. RC was defined as those with concurrent overfat (body fat percentage $\geq 25\%$ for men and $\geq 35\%$ for women) and myopenia (appendicular skeletal muscle mass index ≤ 7.0 kg/m² in men and ≤ 5.7 kg/m² in women) in this study. Multivariate logistic regression analysis was performed to identify the association between disease characteristics and RC in RA patients with normal BMI, following the step-forward selection rule that variables were included

in the equation when the P value was <0.05 or removed when the P value was >0.10 .

Results: 1. There were 516 RA patients recruited, with 13.8% RC as well as 17.4% underweight, 56.4% normal weight, 22.5% overweight and 3.7% obese respectively. Among 71 RA patients with RC, 73.2% showed normal BMI, while 2.8% underweight, 22.5% overweight and 1.4% obese. Among RA patients with normal BMI (n=291), 17.9% patients showed RC, 28.1% showed normal fat but myopenia, 1.4% showed overfat but non-myopenia, while 52.6% showed both normal fat and non-myopenia.

2. For RA patients with normal BMI, compared with those with both normal fat and non-myopenia, RA patients with RC were older with longer disease duration, higher disease activity indicators including 28TJC, PtGA, PrGA, PainVAS, ESR, CRP, DAS28-CRP, SDAI and CDAI, higher functional indicators including HAQ-DI and rate of functional limitation, higher radiographic assessment including mTSS, JSN and JE subscores, higher rate of previous use of glucocorticosteroids (75.0% vs. 52.3%), and higher prevalence of hypertension (25.0% vs. 7.8%). Further compared with those with normal fat but myopenia, RA patients with RC showed the similar results with significantly longer disease duration, higher CRP, HAQ-DI, mTSS, JSN subscore, JE subscore, and higher rate of previous use of glucocorticosteroids (all $P<0.0167$, bonferroni correction). 3. Multivariate logistic regression analysis showed that CRP ($OR=1.024$, 95%CI: 1.009-1.040), mTSS ($OR=1.017$, 95%CI: 1.010-1.025), previous use of glucocorticosteroids ($OR=2.605$, 95%CI: 1.217-5.575), and suffering from hypertension ($OR=3.462$, 95%CI: 1.448-8.274) were positively associated with RC in RA patients with normal BMI.

Conclusion: Our data show rheumatoid cachexia is associated with worse disease including RA disease activity, functional limitation and radiographic joint damage, which imply that RC should be emphasized especially in RA patients with normal BMI.

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THU0070

WHAT IS THE ADDITIONAL VALUE OF MRI OF THE FOOT TO THE HAND IN UNDIFFERENTIATED ARTHRITIS TO PREDICT RHEUMATOID ARTHRITIS DEVELOPMENT?

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Background: MRI-detected subclinical joint inflammation in hand-joints of patients with undifferentiated arthritis (UA) predicts progression to rheumatoid arthritis (RA). It is unknown if adding MRI of the foot increases predictive accuracy compared to the hand alone.

Objectives: To assess whether MRI-detected inflammation of the foot is predictive for RA-development, and whether combining MRI-detected inflammation of the foot to that of the hand is of additional value.

Methods: 1.5T-contrast-enhanced MRI of unilateral foot (MTP-1-5), and hand (MCP-2-5 and wrist) was performed in 123 patients presenting with UA (not fulfilling 2010 RA-criteria) and scored for bone marrow edema (BME), synovitis and tenosynovitis. Symptom-free controls (n=193) served as a reference for defining an abnormal MRI. Patients were followed for RA-development ≤ 1 -year, defined as fulfilling classification criteria or initiation of disease modifying anti-rheumatic drugs because of the expert opinion of RA. The added predictive value of foot-MRI to hand-MRI was evaluated.

Results: 52% developed RA. Foot tenosynovitis was predictive (OR 2.55, 95%CI 1.01-6.43), independent of BME and synovitis (OR 3.29, 95%CI 1.03-10.53), but not independent of CRP and number of swollen joints (OR 2.14, 95%CI 0.77-5.95). Hand tenosynovitis was also predictive independent of BME and synovitis (OR 3.99, 95%CI 1.64-9.69) and independent of CRP and swollen joints (OR 2.36, 95%CI 1.04-5.38). Adding foot tenosynovitis to hand tenosynovitis changed sensitivity from 72% to 73%, specificity from 59% to 54% and AUC from 0.66 to 0.64, the net reclassification index was -3.5.

Conclusion: MRI-detected tenosynovitis of the foot predicts progression to RA. However adding MRI of the foot does not improve predictive accuracy compared to MRI of the hand alone. In view of cost-reduction, performance of foot-MRI for prognostic purposes in UA can be omitted.