Supplementary Materials: Corrosion Behavior of AZ91D Magnesium Alloy with a Calcium–Phosphate–Vanadium Composite Conversion Coating

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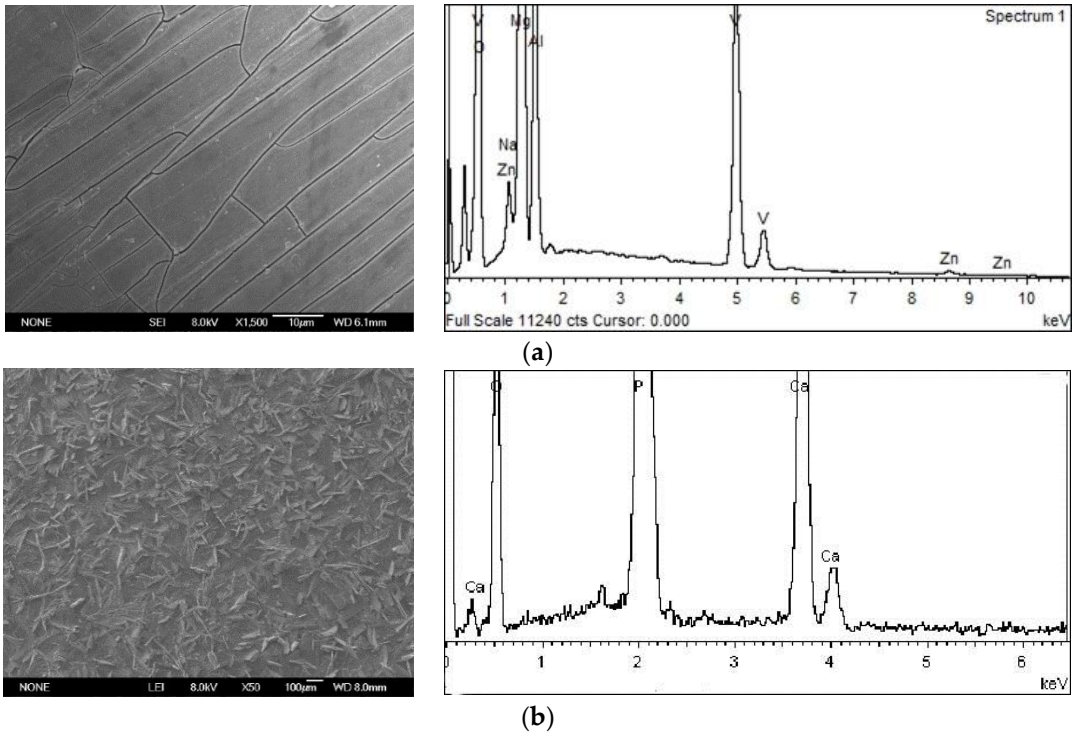


Figure S1. SEM images and EDS analysis of (**a**) pure V coating and (**b**) Ca–P coating.

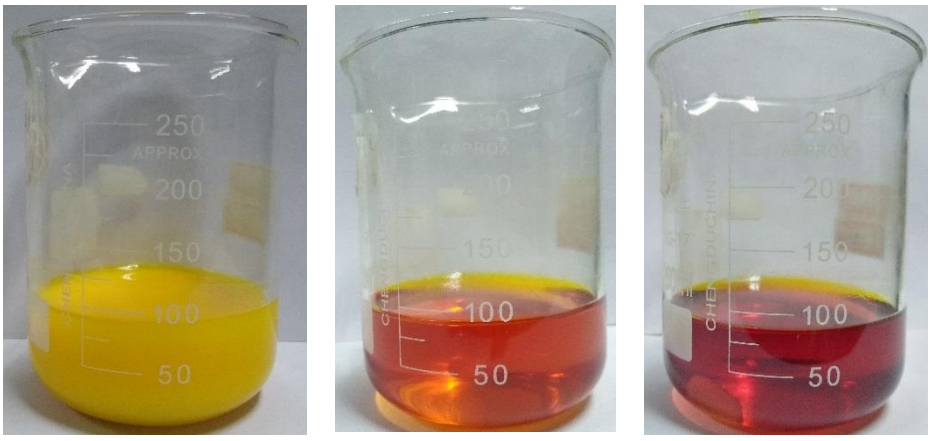


Figure S2. Photos of the different solutions: (**a**) the $NaVO_3$ solution; (**b**) the conversion solution after adjusting pH to 3.0; (**c**) the conversion solution after removing the AZ91D samples.

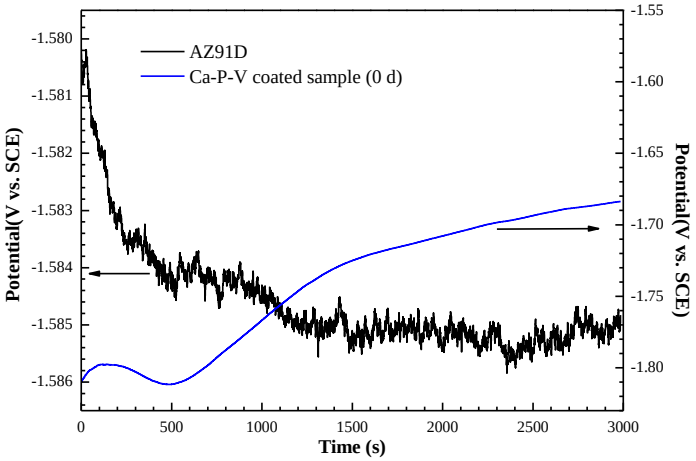


Figure S3. Open circuit potential curves of the uncoated AZ91D substrate and the substrate coated with Ca–P–V composite coating in 3.5 wt % NaCl solution as a function of time. The Ca–P–V coated sample (0 d) indicates the sample is not immersed in 3.5 wt % NaCl solution before OCP test.

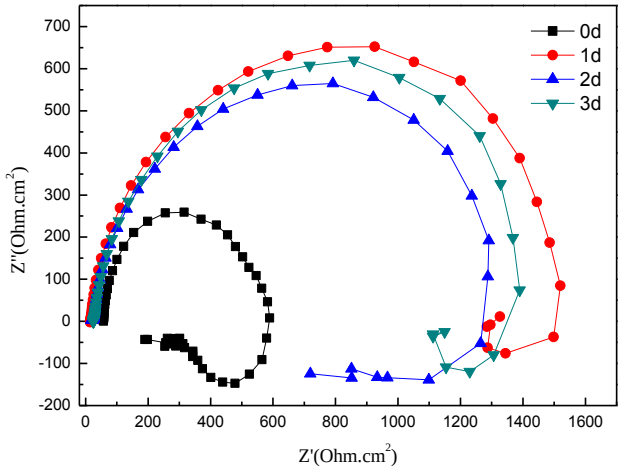
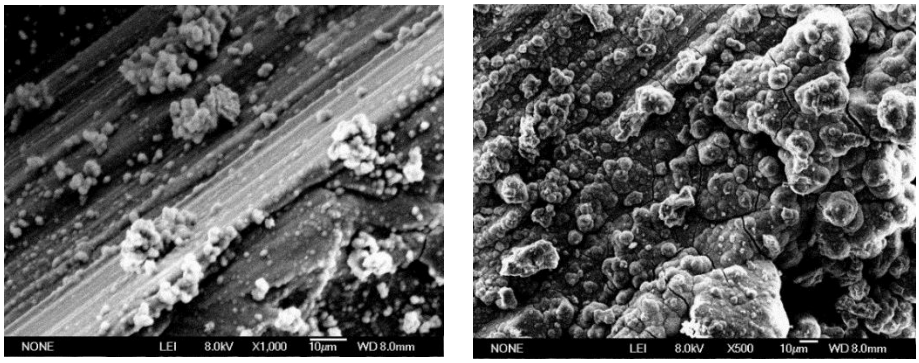


Figure S4. Nyquist plots for uncoated AZ91D substrate after immersion for different days in 3.5 wt % NaCl solution.



(**a**) (**b**)

Figure S5. SEM images of the Ca–P–V coating after immersion in 3.5 wt % NaCl solution for (**a**) 3 d and (**b**) 5 d.