Moment infinite divisibility and completion problem

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In the middle of the huge impact of the work of Jan Stochel and his collaborators in many directions and topics of mathematics, I'll present here a tiny small sample that we used and are using in our work with Raul Curto (Iwoa) and George Exner (Bucknell) in the study of some properties of unilateral weighted shifts, namely n-contractivity, k-hyponormality and moment infinite divisibility and related matters.

References

[1] Benhida, C., Curto, R.E., Exner, G.R.: Moment infinitely divisible weighted shifts. Complex Anal. Oper. Theory 13, 241–255 (2019)

[2] Benhida, C., Curto, R.E., Exner, G.R.: Conditional positive definiteness as a bridge between k-hyponormality and n-contractivity. Linear Algebra Appl. 625 (2021), 146–170.

[3] Benhida, C., Curto, R.E., Exner, G.R.: Moment infinite divisibility of weighted shifts: sequence conditions. Complex Anal. Oper. Theory 16 (2022), no. 1, Paper No. 5, 23 pp

[4] Jablonski, Z.J., Jung, I.B., Kwak, J.A., Stochel, J.: Hyperexpansive completion problem via alternating sequences: an application to subnormality. Linear Alg. Appl. 434, 2497–2526 (2011)

[5] Jabłoński, Z.J., Jung, I.B., Stochel, J.: Conditionally positive definiteness in operator theory, Dissertationes Math. 578 (2022), 1–64.