## Polish pension fund sector: interfund linkage analysis

This study explored interfund linkages based on data which originate from the Polish pension fund sector. The methodology proposed in the paper allows one to classify pension funds operating within the pension sector into four groups, namely: aggressive funds, funds oriented towards preservation of their member portfolios, funds oriented towards growth in member portfolios and weakly oriented funds. Our investigation shows that:

- \* NN and Ergo are aggressive funds. They perform stable policy in respect to members and other funds.
- $\ast\,$  none of the funds commonly considered as sector leaders was classified as an aggressive pension fund,
- \* the modest scores of CU, PZU and AIG cannot be explained by the fact that each of these funds manage assets whose value is among the highest in the pension sector,
- $\ast~$  the advantageous structure of savings transfers helps NN to achieve dominance over PZU,
- $\ast\,$  funds oriented towards growth in member portfolios are rare in the Polish pension fund sector.

By means of sensitivity analysis, we also answered the question which savings transfers are the most important, in the sense that changes in them cause the greatest perturbations in the whole sector. From a technical point of view, this investigation relies on a search for the most important inverse coefficients in the matrix of savings transfers. A striking empirical finding is that there exists visible connection between both methods, i.e. the most important coefficients investigation and the taxonomy of pension funds operating within the sector. It should be noticed that the most important coefficients can be identified in the case of funds which are also classified as weakly oriented pension funds.

No one can doubt that more can be learned about the pension fund sector through studying streams of insurance contributions, investment profits and transfers of savings jointly than by focusing only on one of them. However, one should realize a crucial assumption about the nature of savings transfers which take place among pension funds operating within the sector. The evidence is modest as to what factors determine members' short-term decisions about changing their present pension fund in the case of a market like the Polish pension fund sector. The empirical evidence supports the hypothesis about proportionality of paid savings transfers to growth in net assets.

It is probable that before the use of our interfund flows model to describe the pension fund sector from a long time perspective, it should be modified in order to include the additional factors determining members' choices over a long-term period.

## References

Gurgul H. and Majdosz P. (2004), *Taxonomy of Polish economy in transition*, Technical and Economical Problems, Quarterly of AGH University of Science and Technology 49, No. 1–2, 171–184.