Supplementary Material (ESI) for New Journal of Chemistry

Preparation, coordination and catalytic use of planar-chiral monocarboxylated dppf analogues

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Electronic Supporting Information

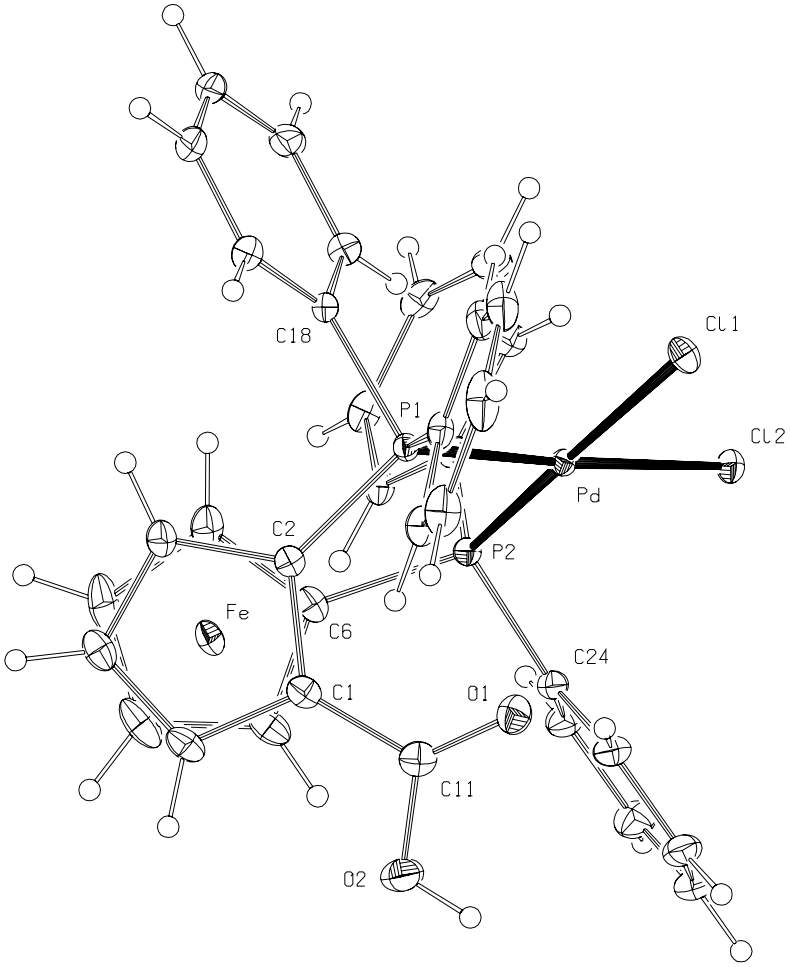


Figure S1. Projection of the complex molecule in the structure of **12a** along the Cg1···Cg2 Line. Displacement ellipsoids enclose 30% probability level.

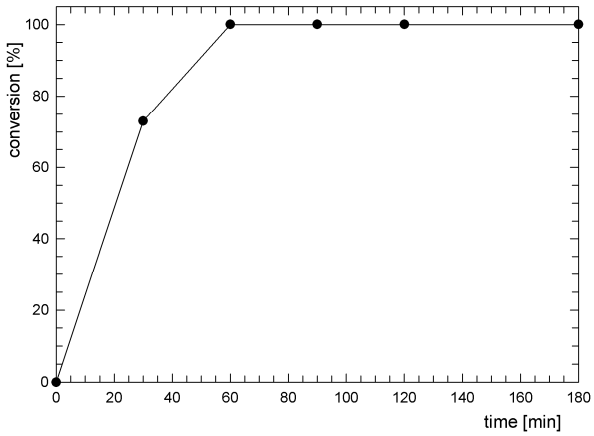
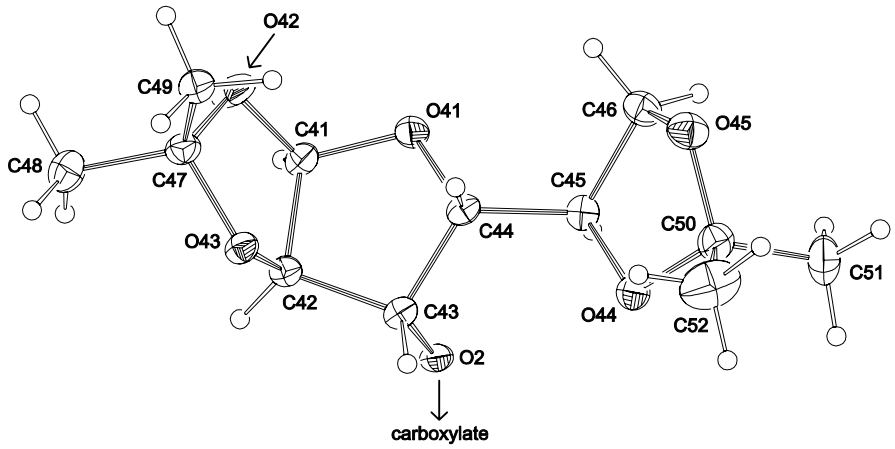


Figure S2. Representatie kinetic profile for the alkylation of **14a** with dimethyl malonate in the presence of catalyst prepared from (S,R_p)-**8** and with BSA/NaOAc as the base (see text for details).

Table S1. Selected Distances and Angles for the Glucofuranosyl Moiety in the Structure of Glycoside (R_p)-**3** (in Å and deg)



Distances		Angles	
O41-C41	1.418(3)	C41-O41-C44	109.8(2)
O41-C44	1.439(3)	C41-O42-C47	110.4(2)
O42-C41	1.405(3)	C42-O43-C47	107.7(2)
O42-C47	1.432(3)	C45-O44-C50	108.5(2)
O43-C42	1.420(3)	C46-O45-C60	105.7(2)
O43-C47	1.432(3)	O41-C41-C42	106.9(2)
O44-C45	1.431(3)	O42-C41-C42	104.9(2)
O44-C50	1.433(3)	O43-C42-C41	103.4(2)
O45-C46	1.424(3)	C41-C42-C43	103.6(2)
O45-C50	1.421(3)	C42-C43-C44	102.2(2)
C41-C42	1.535(3)	O41-C44-C43	104.6(2)
C42-C43	1.524(3)	O44-C45-C46	104.4(2)
C43-C44	1.513(4)	O45-C46-C45	103.1(2)
C44-C45	1.519(4)	O42-C47-O43	105.2(2)
C45-C46	1.527(4)	C48-C47-C49	114.5(2)
C47-C48	1.513(4)	O44-C50-O45	105.1(2)
C57-C49	1.506(4)	C51-C50-C52	113.8(3)
C50-C51	1.512(4)	O2-C43-C42	108.1(2)
C50-C52	1.506(5)	O2-C43-C44	107.3(2)

Table S2. Variation in Asymmetric Induction with the Diastereomer Ratio of the Glycoside Ligand **3**[a]

de_{ligand} (%)	$ee_{product}$ (%)
+100	+65
+50	+27
0	+1
−50	−26
−100	−60

[a] The data are presented graphically in Figure 6. The ligand de is defined as follows: de = ([(R_p)-**3**] – [(S_p)-**3**])/([(R_p)-**3**] + [(S_p)-**3**]). See text for discussion and conditions.