

Supplementary Material

Biological Evaluation and Synthesis of Calcitroic Acid

Olivia B. Yu^a, Daniel A. Webb^a, Elliot S. Di Milo^a, Tania R. Mutchie^a, Kelly A. Teske^a, Taosheng Chen^b, Wenwei Lin^b, Carole Peluso-Iltis^c, Natacha Rochel^c, Moritz Helmstädtter^d, Daniel Merk^d and Leggy A. Arnold^{a,*}

^aDepartment of Chemistry and Biochemistry and Milwaukee Institute for Drug Discovery (MIDD), University of Wisconsin, 3210 N Cramer Street, Milwaukee, WI, 53211, USA.

^bDepartment of Chemical Biology and Therapeutics, 262 Danny Thomas Place, St. Jude Children's Research Hospital, Memphis, TN 38105, USA.

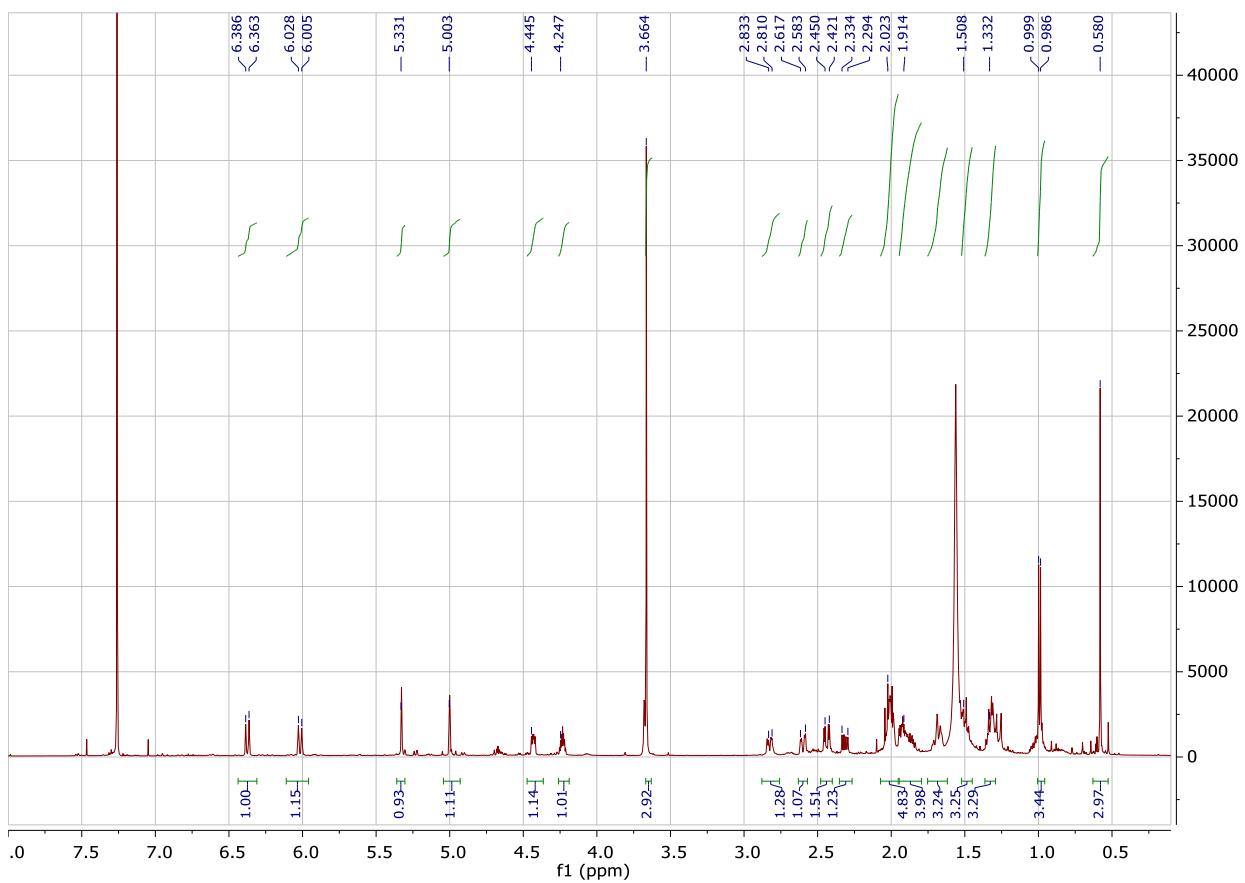
^cInstitut de Génétique et de Biologie Moléculaire et Cellulaire (IGBMC), INSERM, U1258/CNRS, UMR 7104, University of Strasbourg, 67404 Illkirch, France.

^dInstitute of Pharmaceutical Chemistry, Goethe University Frankfurt, Max-von-Laue-Strasse 9, D-60438 Frankfurt, Germany.

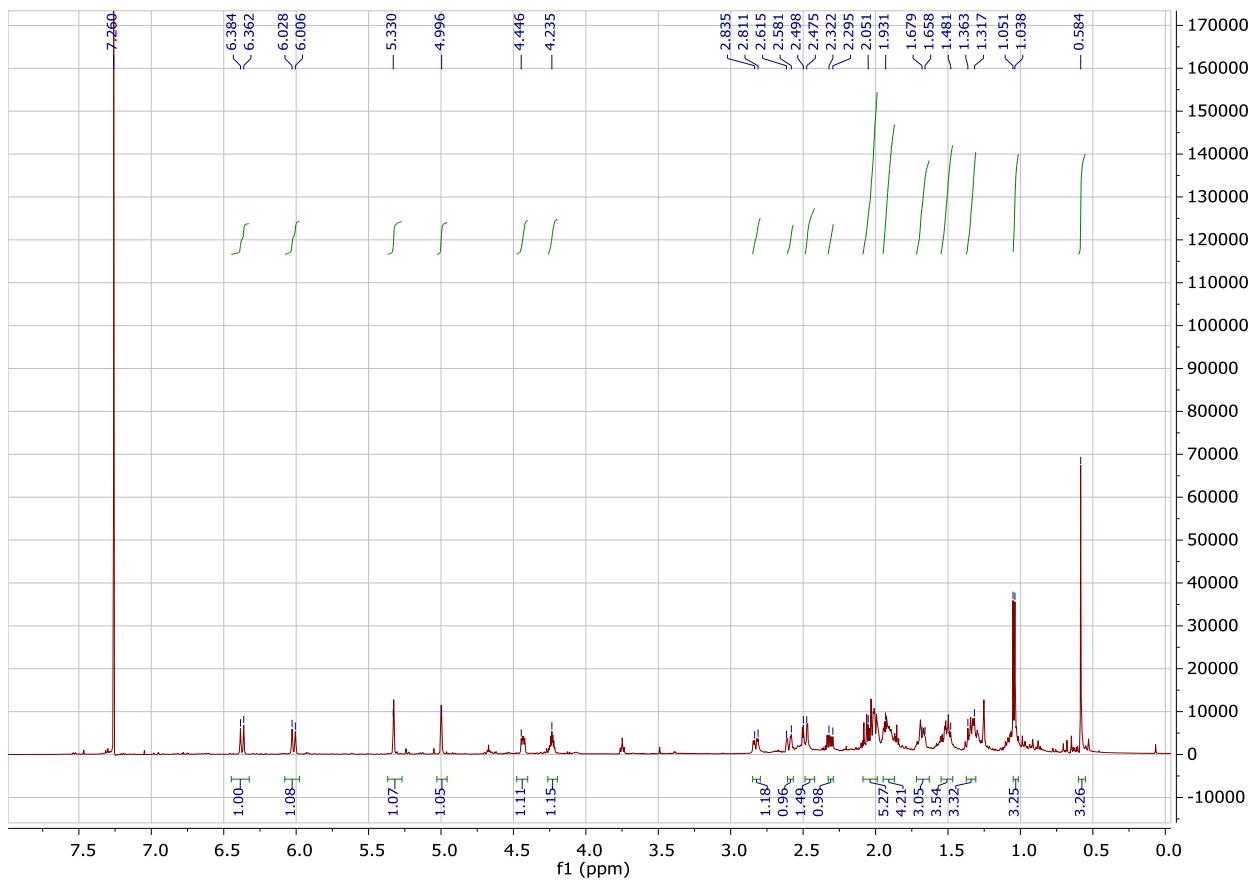
Contents

CTA-ME (5) ¹ H NMR	2
CTA (6) ¹ H NMR	3
Supplementary Table: Data collection and refinement statistics for zVDR-LBD-CTA	4

CTA-ME (5) ^1H NMR



CTA (6) ^1H NMR



Supplementary Table: Data collection and refinement statistics for zVDR-LBD-CTA

zVDR LBD / CTA	
Data Collection and processing statistics	
Beamline	Proxima 2A
Wavelength (Å)	0.98
Space group	P6 ₅ 22
Unit cell parameters (Å, °)	a=b=65.74 c=264.82, α=β=90 γ=120
Resolution (Å)	28.47-2.39
Total reflections	352720
Unique reflections	14257
Multiplicity	24.7
I/σ(I)	12.26
Completeness	99.22
Wilson B-factor	71.49
CC _{1/2}	0.999
Refinement	
Reflections used in refinement	14189
Reflections used for R-free	710
R _{work} / R _{free}	0.24 / 0.28
R.M.S.D. Bond lengths (Å)	0.004
R.M.S.D. Bond angles (°)	0.64
Ramachandran	
Outliers (%)	0
Favored (%)	95.85
Mean B factor (Å ²)	
Protein	88.08
Ligand	77.26