REACTOR

ARRANGEMENT

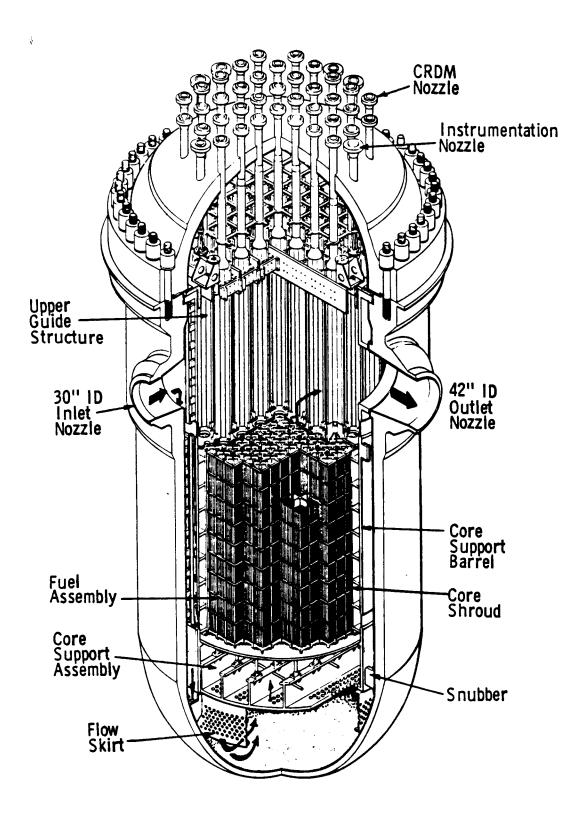
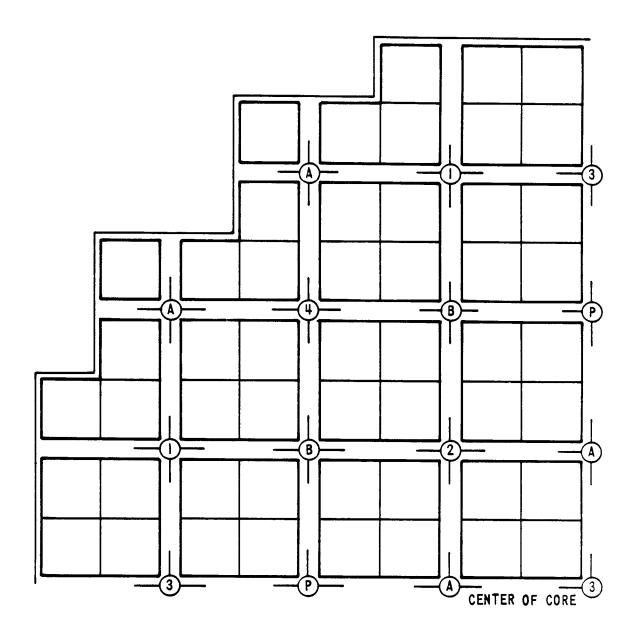


FIGURE 3-2 Revision 21

POSITION OF FUEL ASSEMBLIES AND CONTROL ROD GROUPS IN THE PALISADES CORE



LEGEND

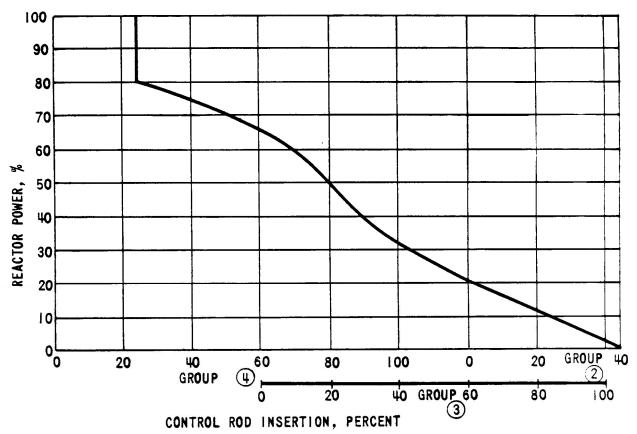
CONTROL ROD GROUPS

() (2 (3) (4) REGULATING

(A) (B) SHUT DOWN

P PART LENGTH

CONTROL ROD INSERTION LIMITS



FOUR PUMP OPERATION

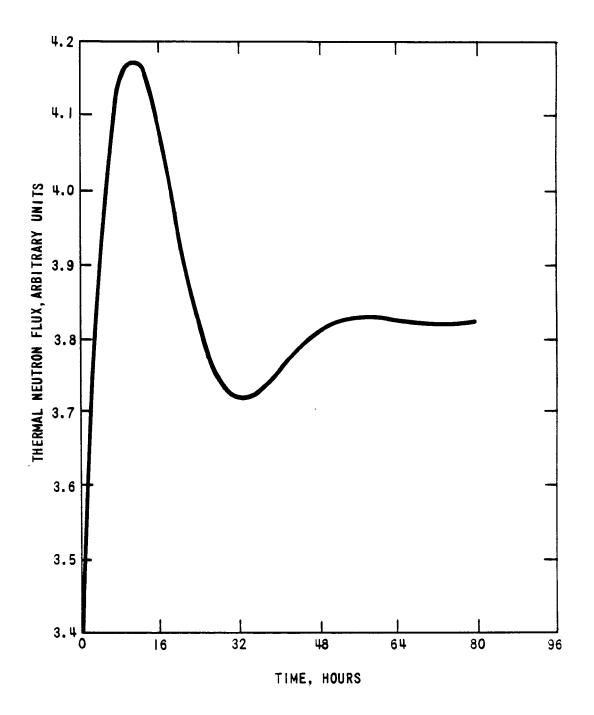
FIGURE 3-4 Revision 21

REACTIVITY DIFFERENCE BETWEEN FUNDAMENTAL AND EXCITED STATES OF A BARE CYLINDRICAL REACTOR

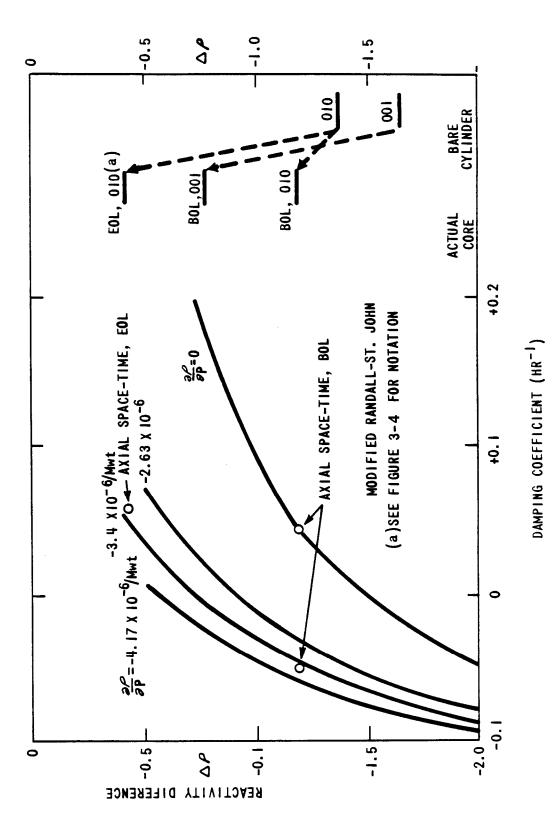
1	STATIONARY EIGENVALUES	EIGENFUNCTION	HARMONIC
1.00	000*	J ₀ (≪ ₀₁ r)** cosβz	FUNDAMENTAL
0.99 0.98	- 010	J ₀ ([∝] ₀₁ r) SIN 2βZ J ₁ (∝ ₁₁ r) COSβ Z COS θ	I st axial I st azimuthal
끸 ^{0.97}	011	J ₁ ([~] 11r)SIN 2 <u>B</u> Z COS 9	I st axial, i st azimuthal
EIGENVALUE 0.96	- 002 020	$J_2(\stackrel{\alpha}{\sim}_{21}r) \cos\beta z \cos 2\theta$ $J_0(\stackrel{\alpha}{\sim}_{01}r) \cos 3\beta z$	2 nd AZIMUTHAL 2 nd AXIAL
0.95	012 021	J ₀ ([∞] ₀₂ r) COSBZ J ₂ ([∞] ₂₁ r) SIN 2BZ COS 29 J ₁ ([∞] ₁₁ r) COS 3BZ COS 8	I st RADIAL I st AXIAL, 2 nd AZIMUTHAL 2 nd AXIAL, I st AZIMUTHAL
0.94	I 10 _	J ₀ ([≪] 02 ^r) SIN 2₿Z	I st RADIAL, I st AXIAL
0.93	022	J ₂ (≪ ₂₁ r) COS 3βZ COS 29	2 nd AXIAL, 2 nd AZIMUTHAL

- * THE INDICES INDICATE RADIAL, AXIAL AND AZIMUTHAL COMPONENTS OF THE SEPARABLE MODES IN THAT ORDER
- ** ∝ ijINDICATES THE jth ZERO OF THE ith BESSEL FUNCTION

THERMAL NEUTRON FLUX AT THE CENTER OF THE CORE VS TIME

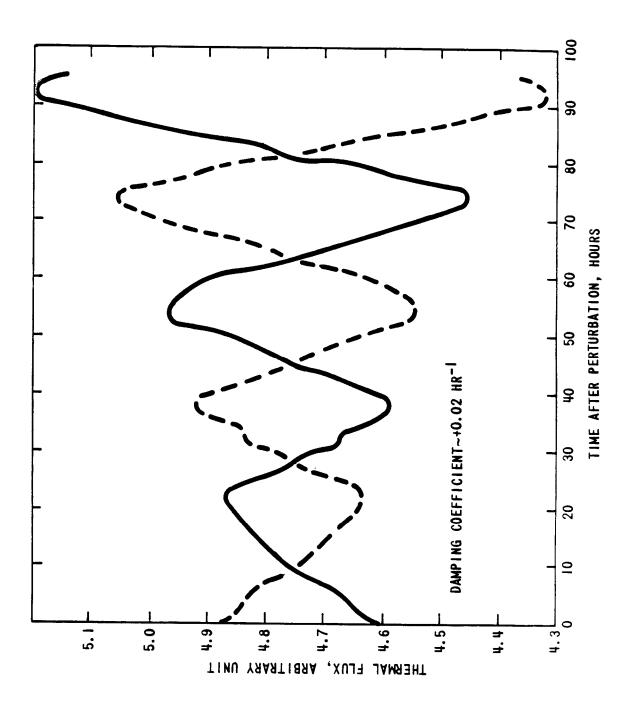




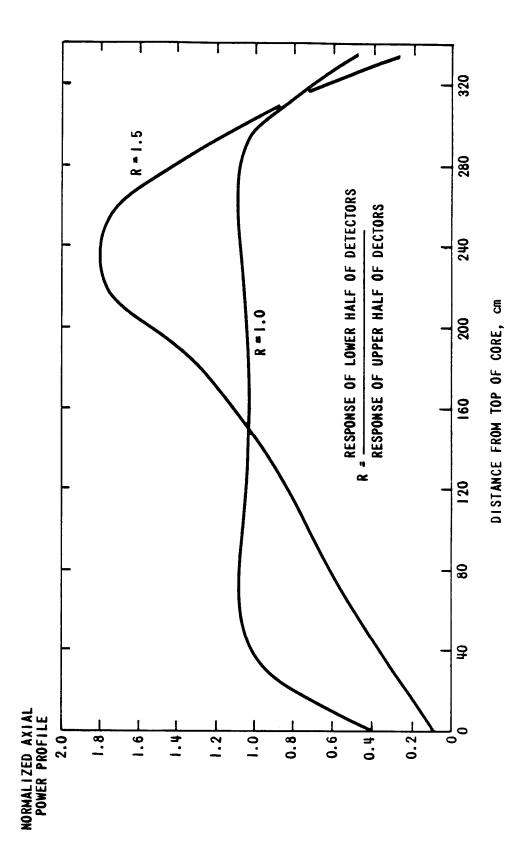


DAMPING COEFFICIENT VS REACTIVITY DIFFERENCE BETWEEN FUNDAMENTAL AND EXCITED STATE

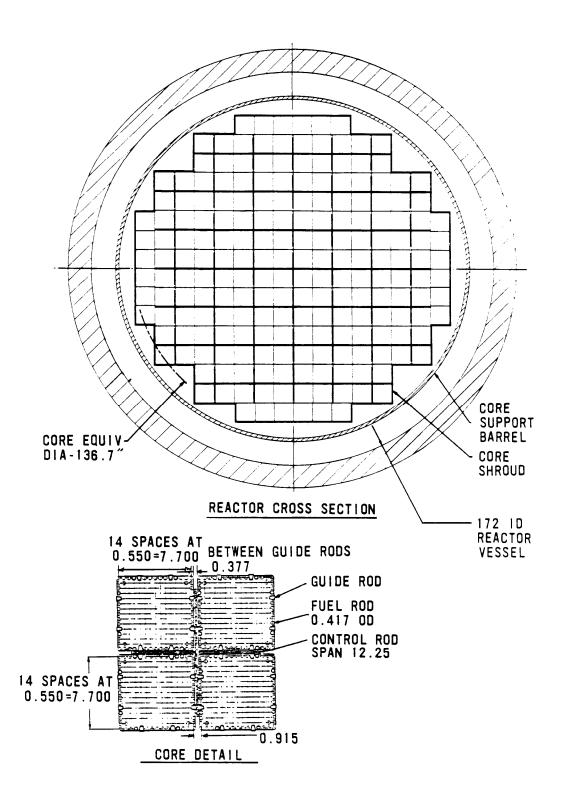
END OF LIFE AXIAL OSCILLATIONS WITH DOPPLER FEEDBACK, FULL POWER (2-HOUR TIME STEPS)



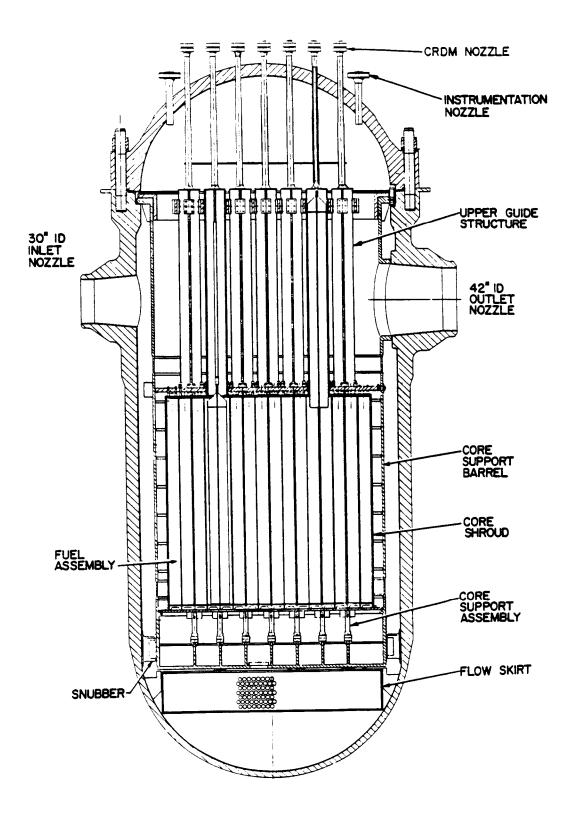
SPLIT DETECTOR RESPONSE TO AXIAL POWER PROFILES IN THE CORE



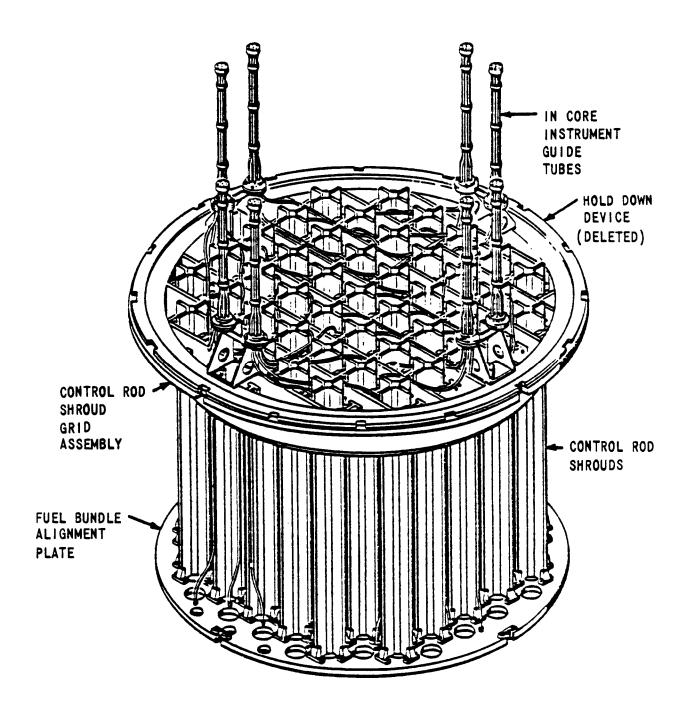
REACTOR CORE CROSS SECTION



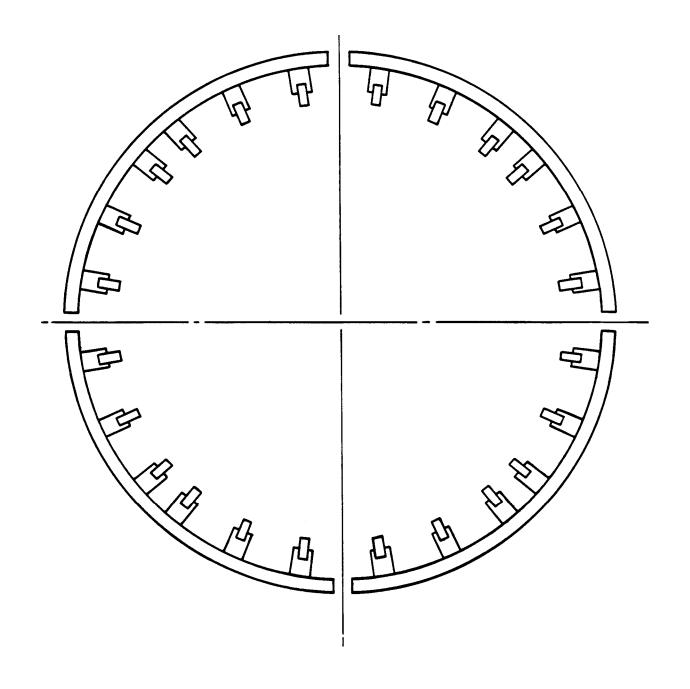
REACTOR ARRANGEMENT



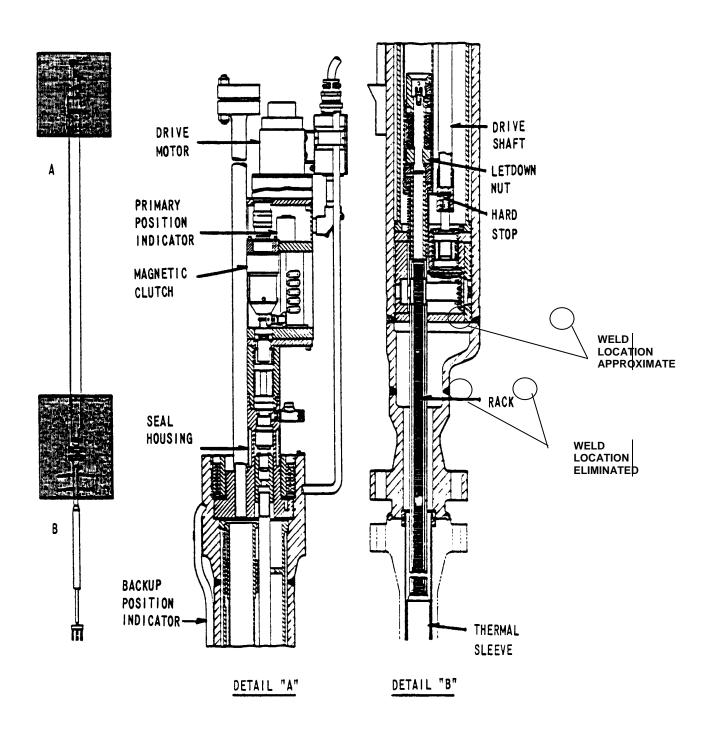
UPPER GUIDE STRUCTURE ASSEMBLY



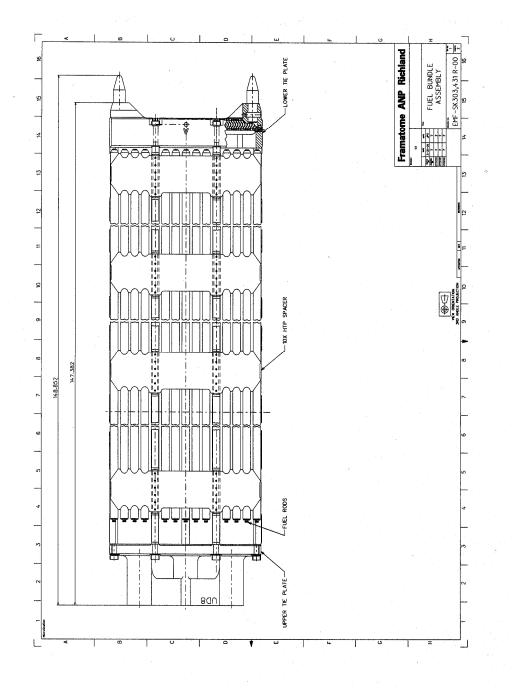
HOLD DOWN RING



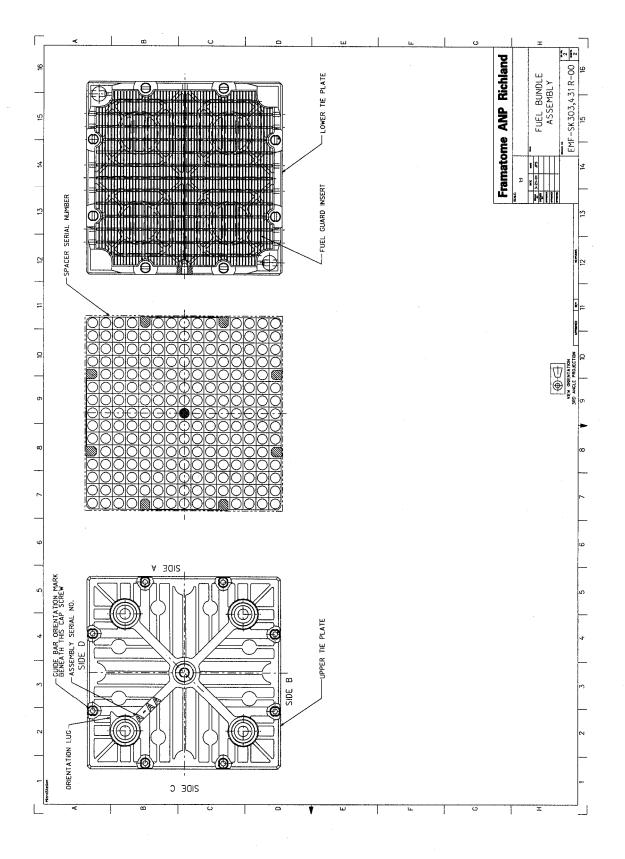
CONTROL ROD DRIVE MECHANISM



FUEL BUNDLE ASSEMBLY Sheet 1 of 2



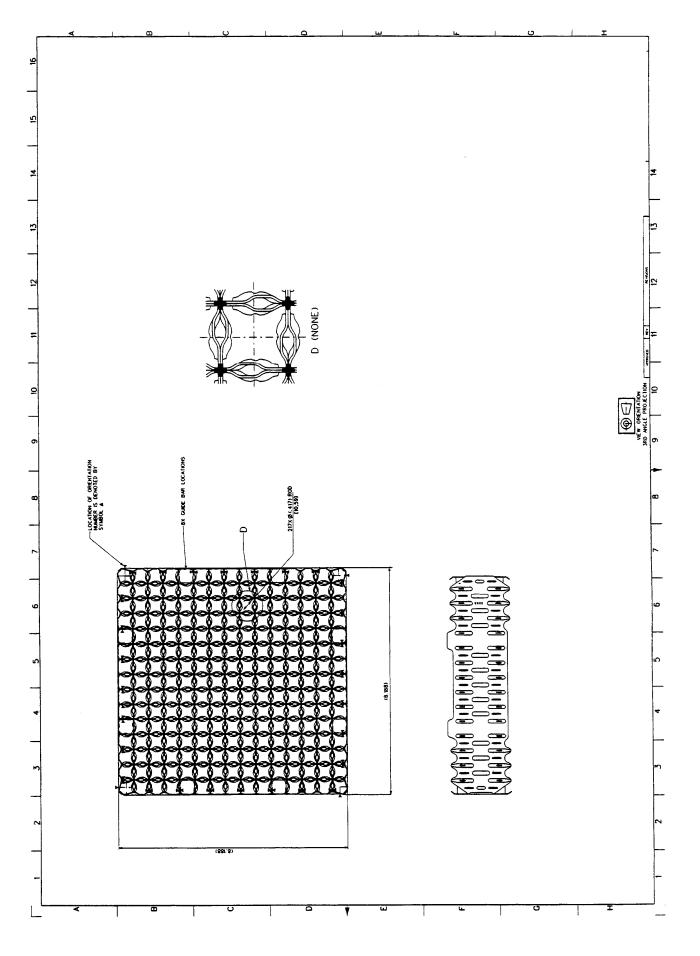
FUEL BUNDLE ASSEMBLY Sheet 2 of 2



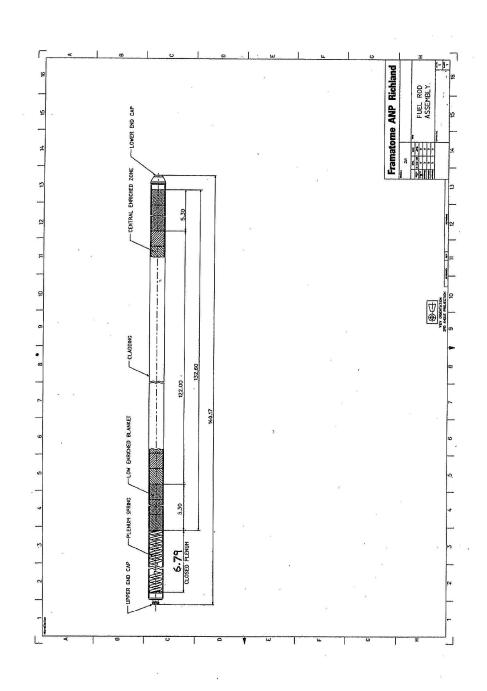
FSAR CHAPTER 3 - REACTOR

FIGURE 3-17 Revision 21

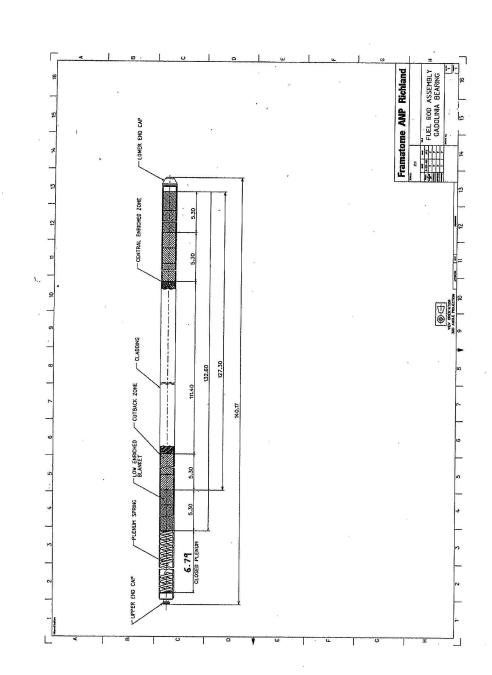
SPACER ASSEMBLY HTP







FUEL ROD ASSEMBLY GADOLINIA BEARING



CONTROL ROD

