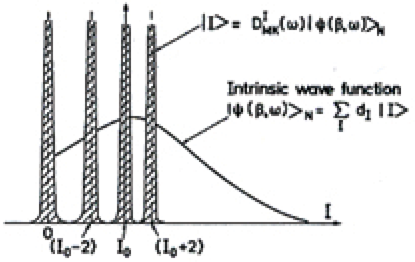
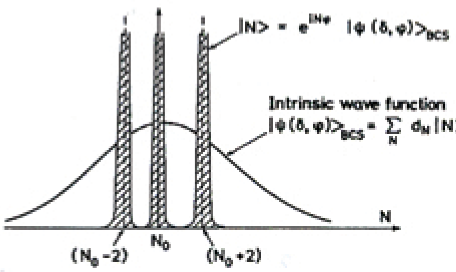
TABLE E.1 (*Continued*)

Quadrupole		Pairing
	The relation between the two sets of parameters is	
$a_\nu = \sum_\mu K_\mu D^2_{\mu\nu}(\omega)$ $(a_0 = \beta\cos\gamma,\ a_2 = a_{-2} = \frac{1}{2}\beta\sin\gamma)$		$\Delta_\alpha = \Delta e^{-i\alpha\varphi}$
	A microscopic description of $\lvert\psi\rangle$ is given by the	
Nilsson wave function $\lvert\psi(\beta,\omega)\rangle_N = \prod_{aa'} \gamma'^{+}_{a\Omega a}\gamma'_{a'\Omega a'}\lvert 0\rangle = \sum_I d_I \lvert I\rangle$		BCS wave function $\lvert\psi(\delta,\varphi)\rangle_{BCS} = \prod_\nu \alpha'(\nu)\lvert 0\rangle = \prod_\nu (U(\nu) + V(\nu)c'^{+}(\nu)c'^{+}(\bar\nu))\lvert 0\rangle$ $= \sum_N d_N \lvert N\rangle$
	where	
$\gamma'_{a\Omega a} = \sum_j A_j^a \sum_{\Omega'} D^j_{\Omega'\Omega}(\omega) c^{+}_{aj\Omega'}$		$\alpha'(\nu) = U(\nu)e^{-i\varphi}c^{+}(\nu) - V(\nu)e^{-i\varphi}c(\bar\nu)$
	creates a	
Nilsson particle		quasiparticle
	in the intrinsic frame	
	$\lvert\psi\rangle$ is eigenfunction of the single-particle Hamiltonian	
$H = H_{sp} + V_Q$		$H = H_{sp} + V_p$
	and does not have a definite	
angular momentum.		number of particles.
	Its structure as a function of	
I (total wave function)		N (total wave function)
	is equal to	
	The frequency of rotation	
$\dot\omega$		$\dot\varphi$
	changes when one goes from a physical state with	
total angular momentum $\mathbf{I}_1$		particle number N_1
	to another physical state with	
total angular momentum $\mathbf{I}_2$		particle number N_2
	Associated with this change in	
$\dot\omega$		$\dot\varphi$
	there is a change in the total energy	
$\hbar\dot\omega_\chi = \partial\mathscr{E}_Q/\partial I$ (Coriolis force)		$\lambda = \hbar\dot\varphi = \partial\mathscr{E}_p/\partial N$
	The rotational energy is given by	
$\mathscr{E}_I = \frac{\hbar^2}{2\mathscr{I}} I(I+1) +$ (higher powers in I)		$\mathscr{E}_N = \lambda(N - N_0) + \frac{\hbar^2}{2}\frac{1}{\hbar^2(\partial N/\partial\lambda)}(N - N_0)^2$ $+$ (higher powers in N)