Author Year; Country Score Research Design Sample Size	Methods	Outcome
Thyberg et al. 1994; Sweden Pre-post N=10	<b>Population:</b> 10 subjects with cervical or high thoracic SCI. <b>Treatment:</b> 10 mg nifedipine sublingually during cystometry. <b>Outcome Measures:</b> blood pressure and heart rate.	<ol> <li>Patients demonstrated decreased maximum SBP and DBP after the administration of nifedipine.</li> <li>Maximum SBP decreased from 147 mmHg to 118 mmHg.</li> <li>The decrease in BP was due to a decrease in baseline pressure and BP response during cystometry.</li> </ol>
Kabalin et al. 1993; USA Case series N=20	<b>Population:</b> 10 subjects with tetraplegia, 10 with paraplegia. <b>Treatment:</b> 10-30 mg nifedipine sublingually during Estracorporal shock wave lithotripsy (ESWL) for kidney stone treatment. <b>Outcome Measures:</b> electrocardiogram, blood pressure, pulse rate, peripheral oxygen saturation.	<ol> <li>All but one SCI patient demonstrated AD during ESWL with maximal increase in systolic BP of 74 mmHg.</li> <li>Nifedipine was administered sublingually and controlled BP elevation.</li> <li>For severe, acute increases in BP, ESWL stimulation was momentarily discontinued until pharmacological control of the BP was achieved, after which treatment was continued.</li> </ol>
Steinberger et al. 1990; USA Prospective controlled trial N=10	<ul> <li>Population: All subjects with injury levels above T5; mean 9 years post-injury (range 3-21 years).</li> <li>Treatment: 10-30 mg nifedipine sublingually 15 min prior to electroejaculation or no nifedipine.</li> <li>Outcome Measures: blood pressure, voltage and current delivered during electroejaculation.</li> </ul>	<ol> <li>In 9/10 patients, blood pressures were markedly lower after nifedipine pretreatment.</li> <li>Compared with no treatment, SBP during electroejaculation was lower with nifedipine pretreatment (168 mmHg vs. 196 mmHg).</li> <li>In 9/10 patients, tolerance to electrical stimulation was ≥ post nifedipine pretreatment.</li> </ol>
Dykstra et al. 1987; USA Pre-post N=7	Population: Subjects with complete, cervical injuries. Treatment: 10 mg nifedipine during cystosopy procedure. Outcome measures: blood pressure, presence of AD.	<ol> <li>Nifedipine alleviated AD when given sublingually during cystoscopy and prevented autonomic hyperreflexia when given orally 30 minutes before cystoscopy.</li> <li>No adverse drug effects were observed.</li> </ol>
Lindan et al. 1985; USA Prospective controlled trial N=12	<b>Population:</b> 12 subjects with tetraplegia. <b>Treatment:</b> phenoxybenzamine (10mg bid) versus nifedipine (20mg bid) administration at least 4 days prior cystometry. 11 patients were also tested for the efficacy of 10 mg nifedipine (sublingually or by mouth) for controlling AD symptoms. <b>Outcome Measures:</b> blood pressure.	<ol> <li>Neither drug prevented AD secondary to bladder filling, and a significant number of patients developed hypotension.</li> <li>Sublingual dose of nifedipine (10 mg) was effective in managing acute attacks of AD.</li> </ol>